CLAIMS AS AMENDED WITH UNDERLINES AND BRACKETS

Please amend claims 98 - 103, 105 - 118, 120 - 148, 150 - 156, 158 - 160, 162 - 173, 187 - 192, 194 - 197, 199 - 214, 216 - 220, 223 - 269, 271 - 281, 284, 285, 381 - 387, 389 - 391, 394 - 397, 399, 402 - 405, 407 - 409, 411, 413, 414, 417, 420, 422, 423, 425, 427, 428, 430, 431, 433, 434, 436, 437, 439, 440, 443 - 446, 448, 450 - 453, 455, 456, 458 - 461, 463, 464, 467 - 471, 473, 475, 477, 478, 480, 483 - 485, 487, 488, 490 - 494, 496, 497, 499, 501, 502, 504, 505, and 507 - 510, as follows:

98. (Amended) A system comprising:
a first memory storing prior pixel image information, the prior pixel image information representing a prior image;
a second memory storing next pixel image information, the next pixel image information representing a next image;
a spatial interpolation circuit coupled to the first memory and coupled to the second memory, the spatial interpolation circuit generating spatial<u>ly</u> [interpolation] <u>interpolated image</u> information in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;
a subpixel vector change circuit coupled to the first memory and coupled to the second memory, the subpixel vector change circuit generating subpixel vector change information having subpixel resolution in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;
a transform processor coupled to the spatial interpolation circuit, the transform processor generating transformed image information in response to the spatial<u>ly</u> [interpolation] <u>interpolated image</u> information generated by the spatial interpolation circuit;
a weight circuit generating weight information;
a scale factor circuit generating scale factor information;
a weighting and scaling circuit coupled to the scale factor circuit, coupled to the weight circuit, and coupled to the transform processor, the weighting and scaling circuit generating scaled weighted image information in response to the transformed image information generated by the transform processor, in response to the scale factor information generated by the scale factor circuit, and in response to the weight information generated by the weight circuit;
a resolution reduction circuit coupled to the weighting and scaling circuit, the resolution reduction circuit generating reduced resolution image information in response to the scaled weighted image information generated by the weighting and scaling circuit;
an image communication link coupled to the resolution reduction circuit, the image communication link communicating output image information in response to the reduced resolution image information generated by the resolution reduction circuit;
a vector communication link coupled to the subpixel vector change circuit, the vector communication link communicating output subpixel vector information in response to the subpixel vector change information generated by the subpixel vector change circuit;
a display circuit coupled to the resolution reduction circuit, the display circuit generating display image information in response to the reduced resolution image information generated by the resolution reduction circuit; and
a display device coupled to the display circuit, the display device displaying an image in response to the display image information generated by the display circuit.

99. (Amended) A system as set forth in claim 98,
wherein the first memory is a first intermediate memory storing the prior pixel image information as intermediate prior pixel image information, and the prior pixel image information representing the prior image;
wherein the second memory is a second intermediate memory storing the next pixel image information as intermediate next pixel image information, the second memory storing the next pixel image information and the next pixel image information representing the next image;
wherein the spatial interpolation circuit is a two dimensional spatial interpolation circuit generating the spatial<u>ly</u> [interpolation] <u>interpolated image</u> information as two dimensional spatial<u>ly</u> [interpolation] <u>interpolated image</u> information in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;
wherein the transform processor is a frequency domain transform processor generating the transformed image information as frequency domain transformed image information in response to the spatial<u>ly</u> [interpolation] <u>interpolated image</u> information generated by the spatial interpolation circuit;
wherein the weight circuit is a shaded weight circuit generating the weight information as shaded weight information;
wherein the scale factor circuit is a geometric scale factor circuit generating the scale factor information as geometric scale factor information;
wherein the weighting and scaling circuit is a sum of the products weighting and scaling circuit generating the scaled weighted image information as sum of the products scaled weighted image information in response to the transformed image information generated by the transform processor, in response to the scale factor information generated by the scale factor circuit, and in response to the weight information generated by the weight circuit;
wherein the resolution reduction circuit is a fraction removal resolution reduction circuit generating the reduced resolution image information as fraction removal reduced resolution image information in response to the scaled weighted image information generated by the weighting and scaling circuit;
wherein the image communication link is a digital image communication link communicating the output image information as digital output image information in response to the reduced resolution image information generated by the resolution reduction circuit;
wherein the vector communication link is a digital vector communication link communicating output subpixel vector information in response to the subpixel vector change information generated by the subpixel vector change circuit as digital output subpixel vector information;
wherein the display circuit is a data decompression display circuit generating the display image information as data decompression display image information in response to the reduced resolution image information generated by the resolution reduction circuit; and
wherein the display device is a CRT display device displaying the image as a CRT image in response to the display image information generated by the display circuit.

100. (Amended) A system as set forth in claim 98,
wherein the first memory is a first mosaic memory storing the prior pixel image information as prior pixel mosaic image information, and the prior pixel image information representing the prior image;
wherein the second memory is a second mosaic memory storing the next pixel image information as next pixel mosaic image information, the second memory storing the next pixel image information and the next pixel image information representing the next image;
wherein the spatial interpolation circuit is a half pixel resolution spatial interpolation circuit generating the spatial<u>ly</u> [interpolation] <u>interpolated image</u> information as half pixel resolution spatial<u>ly</u> [interpolation] <u>interpolated image</u> information in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;
wherein the subpixel vector change circuit is an XIP, YIP subpixel vector change circuit generating the subpixel vector change information having subpixel resolution as XIP, YIP vector change information having subpixel resolution in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;
wherein the transform processor is a coordinate transform processor generating the transformed image information as coordinate transformed image information in response to the spatial<u>ly</u> [interpolation] <u>interpolated image</u> information generated by the spatial interpolation circuit;
wherein the weight circuit is a weight memory circuit generating the weight information as stored weight information;
wherein the scale factor circuit is a scale factor memory circuit generating the scale factor information as stored scale factor information;

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wherein the weighting and scaling circuit is an antialiasing weighting and scaling circuit generating the scaled weighted image information as antialiasing scaled weighted image information in response to the transformed image information generated by the transform processor, in response to the scale factor information generated by the scale factor circuit, and in response to the weight information generated by the weight circuit;

wherein the resolution reduction circuit is a truncation resolution reduction circuit generating the reduced resolution image information as truncated reduced resolution image information in response to the scaled weighted image information generated by the weighting and scaling circuit;

wherein the image communication link is a television image communication link communicating the output image information as television output image information in response to the reduced resolution image information generated by the resolution reduction circuit;

wherein the vector communication link is a television vector communication link communicating output subpixel vector information in response to the subpixel vector change information generated by the subpixel vector change circuit as television output subpixel vector information;

wherein the display circuit is a composite display circuit generating the display image information as composite display image information in response to the reduced resolution image information generated by the resolution reduction circuit; and

wherein the display device is a liquid crystal display device displaying the image as a liquid crystal image in response to the display image information generated by the display circuit.

101. (Amended) A system as set forth in claim 98,

wherein the first memory is a first data base memory storing the prior pixel image information, and the prior pixel image information representing the prior image;

wherein the second memory is a second data base memory storing the next pixel image information, the second memory storing the next pixel image information and the next pixel image information representing the next image;

wherein the spatial interpolation circuit is an antialiasing spatial interpolation circuit generating the spatially [interpolation] interpolated image information as antialiasing spatially [interpolation] interpolated image information in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;

wherein the subpixel vector change circuit is an initial point subpixel vector change circuit generating the subpixel vector change information having subpixel resolution as initial point vector change information having subpixel resolution in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;

wherein the transform processor is a Fourier transform processor generating the transformed image information as Fourier transformed image information in response to the spatially [interpolation] interpolated image information generated by the spatial interpolation circuit;

wherein the weight circuit is a subpixel coordinate weight circuit generating the weight information as subpixel coordinate weight information;

wherein the scale factor circuit is a weight scale factor circuit generating the scale factor information as weight scale factor information;

wherein the weighting and scaling circuit is a geometric weighting and scaling circuit generating the scaled weighted image information as geometric scaled weighted image information in response to the transformed image information generated by the transform processor, in response to the scale factor information generated by the scale factor circuit, and in response to the weight information generated by the weight circuit;

wherein the resolution reduction circuit is a roundoff resolution reduction circuit generating the reduced resolution image information as rounded off reduced resolution image information in response to the scaled weighted image information generated by the weighting and scaling circuit;

wherein the image communication link is a data compressed image communication link communicating the output image information as data compressed output image information in response to the reduced resolution image information generated by the resolution reduction circuit;

wherein the vector communication link is a data compressed vector communication link communicating output subpixel vector information in response to the subpixel vector change information generated by the subpixel vector change circuit as data compressed output subpixel vector information;

wherein the display circuit is an NTSC display circuit generating the display image information as NTSC display image information in response to the reduced resolution image information generated by the resolution reduction circuit; and

wherein the display device is a CRT display device displaying the image as a CRT image in response to the display image information generated by the display circuit.

102. (Amended) A system as set forth in claim 98,

wherein the first memory is a first image memory storing the prior pixel image information as eight bit prior pixel image information, and the prior pixel image information representing the prior image;

wherein the second memory is a second image memory storing the next pixel image information as eight bit next pixel image information, the second memory storing the next pixel image information and the next pixel image information representing the next image;

wherein the spatial interpolation circuit is a subpixel resolution spatial interpolation circuit generating the spatially [interpolation] interpolated image information as subpixel resolution spatially [interpolation] interpolated image information in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;

wherein the subpixel vector change circuit is an initial condition subpixel vector change circuit generating the subpixel vector change information having subpixel resolution as initial condition vector change information having subpixel resolution in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;

wherein the transform processor is a geometric transform processor generating the transformed image information as geometric transformed image information in response to the spatially [interpolation] interpolated image information generated by the spatial interpolation circuit;

wherein the weight circuit is a kernel weight circuit generating the weight information as kernel weight information;

wherein the scale factor circuit is a kernel scale factor circuit generating the scale factor information as kernel scale factor information;

wherein the weighting and scaling circuit is a kernel weighting and scaling circuit generating the scaled weighted image information as kernel scaled weighted image information in response to the transformed image information generated by the transform processor, in response to the scale factor information generated by the scale factor circuit, and in response to the weight information generated by the weight circuit;

wherein the resolution reduction circuit is an integer resolution reduction circuit generating the reduced resolution image information as integer reduced resolution image information in response to the scaled weighted image information generated by the weighting and scaling circuit;

wherein the image communication link is a video image communication link communicating the output image information as video output image information in response to the reduced resolution image information generated by the resolution reduction circuit;

wherein the vector communication link is a video vector communication link communicating output subpixel vector information in response to the subpixel vector change information generated by the subpixel vector change circuit as video output subpixel vector information;

wherein the display circuit is a red, green, blue display circuit generating the display image information as red, green, blue display image information in response to the reduced resolution image information generated by the resolution reduction circuit; and

wherein the display device is a red, green, blue display device displaying the image as a red, green, blue image in response to the display image information generated by the display circuit.

105. (Amended) A system comprising:

a first memory storing a frame of prior pixel image information, the frame of prior pixel image information representing a prior image;

a second memory storing a frame of next pixel image information, the frame of next pixel image information representing a next image;

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a prior vector circuit generating prior vector information in response to the frame of prior pixel image information;

a next vector circuit generating next vector information in response to the frame of next pixel image information;

a temporal interpolation circuit generating a frame of temporally interpolated information in response to the prior [pixel image] vector information [stored in the first memory and], in response to the next [pixel image] vector information [stored in the second memory], in response to the frame of prior pixel image information , and in response to the frame of next pixel image information;

[a subpixel vector change circuit generating subpixel vector change information having subpixel resolution in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;] and

a transform processor generating transformed image information in response to the frame of temporally interpolated information, in response to the frame of prior pixel image information , and in response to the frame of next pixel image information .

106. (Amended) A system as set forth in claim 105, further comprising:

an RF communication link communicating output image information in response to the transformed image information.

107. (Amended) A system comprising:

a first memory storing a frame of prior pixel image information, the frame of prior pixel image information representing a prior image;

a second memory storing a frame of next pixel image information, the frame of next pixel image information representing a next image;

a prior vector circuit generating prior motion vector information in response to the frame of prior pixel image information;

a next vector circuit generating next motion vector information in response to the frame of next pixel image information; and

a spatial interpolation processor coupled to the first memory and coupled to the second memory, the spatial interpolation processor generating a frame of spatially [interpolation] interpolated image information in response to the prior [pixel image] motion vector information [stored in the first memory and], in response to the next [pixel image] motion vector information [stored in the second memory], in response to the frame of prior pixel image information , and in response to the frame of next pixel image information

[a subpixel vector change circuit coupled to the first memory and coupled to the second memory, the subpixel vector change circuit generating subpixel vector change information having subpixel resolution in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;

a weight input circuit generating weight input information;

a weight memory;

a writing circuit coupled to the weight input circuit and coupled to the weight memory, the writing circuit writing weight information into the weight memory in response to the weight input information generated by the weight input circuit; and

a weighting processor coupled to the spatial interpolation processor and coupled to the weight memory, the weighting processor generating weighted image information in response to the spatial interpolation information generated by the spatial interpolation processor and in response to the weight information stored in the weight memory].

108. (Amended) A system as set forth in claim 107, further comprising:

an RF communication link coupled to the spatial interpolation processor, the RF communication link communicating output image information in response to the frame of spatially [interpolation] interpolated image information generated by the spatial interpolation processor.

109. (Amended) A process comprising the acts of:

storing a prior 64-pixel block of image information [in a first memory], the prior 64-pixel block of image information representing a prior image;

storing a next 64-pixel block of image information [in a second memory], the next 64-pixel block of image information representing a next image;

generating prior motion vector information in response to the prior 64-pixel block of image information;

generating next motion vector information in response to the next 64-pixel block of image information; and

generating temporally interpolated image information by temporally interpolating [in] between the prior [64-pixel block of image] motion vector information and the next [64-pixel block of image] motion vector information in response to the prior 64-pixel block of image information and in response to the next 64-pixel block of image information [; and

generating subpixel vector change information having subpixel resolution in response to the prior 64-pixel block of image information stored in the first memory and in response to the next 64-pixel block of image information stored in the second memory].

110. (Amended) A process as set forth in claim 109, further comprising the act of:

communicating output image information over an RF data link in response to the [prior 64-pixel block of image information stored in the first memory and in response to the next 64-pixel block of] temporally interpolated image information image information [stored in the second memory].

111. (Amended) A process as set forth in claim 109, further comprising the act of making a DVD product.

112. (Amended) A process as set forth in claim 109, further comprising the acts of:

storing at least two digital bits of information in a plurality of levels in each of a plurality of multilevel memory cells;

generating accessed digital information in response to the at least two digital bits of information stored in each of the plurality of multilevel memory cells; and

generating the [subpixel vector change] temporally interpolated image information in response to the accessed digital information.

113. (Amended) A process comprising the acts of:

storing a frame of prior pixel image information [in a first memory], the frame of prior pixel image information representing a prior image;

storing a frame of next pixel image information [in a second memory], the frame of next pixel image information representing a next image; and

generating subpixel change information having subpixel resolution by subtracting [in] between the frame of prior pixel image information and the frame of next pixel image information.

114. (Amended) A process as set forth in claim 113, further comprising the act of making a digital video disk product in response to process set forth in claim 113.

115. (Amended) A process comprising the acts of:

storing prior pixel image information [in a first memory], the prior pixel image information representing a prior image;

storing next pixel image information [in a second memory], the next pixel image information representing a next image; and

generating 64-pixel blocks of spatially [interpolation] interpolated image information in response to the prior pixel image information [stored in the first memory] and in response to the next pixel image information [stored in the second memory].

116. (Amended) A process as set forth in claim 115, further comprising the act of making a <u>video disk</u> product in response to the 64-pixel blocks of spatial<u>ly</u> [interpolation] <u>interpolated image</u> information.

117. (Amended) A system comprising:

a first memory storing <u>a frame of</u> prior pixel image information, the <u>frame of</u> prior pixel image information representing a prior image;

a second memory storing <u>a frame of</u> next pixel image information, the <u>frame of</u> next pixel image information representing a next image;

a spatial interpolation circuit generating <u>a frame of</u> spatial<u>ly</u> [interpolation] <u>interpolated image</u> information in response to the <u>frame of</u> prior pixel image information and in response to the <u>frame of</u> next pixel image information;

a scale factor input circuit generating scale factor [input] information;

a scale factor memory;

a writing circuit coupled to the scale factor memory and coupled to the scale factor input circuit, the writing circuit writing scale factor <u>input</u> information into the scale factor memory in response to the scale factor [input] information<u>, the scale factor memory storing the scale factor input information</u>; and

a scaling processor coupled to the spatial interpolation circuit and coupled to the scale factor memory, the scaling processor generating [the] scaled image information in response to the scale factor <u>input</u> information stored in the scaled memory and in response to the <u>frame of</u> spatial<u>ly</u> [interpolation] <u>interpolated image</u> information generated by the spatial interpolation circuit.

118. (Amended) A system as set forth in claim 117, further comprising:

an <u>RF</u> communication link coupled to the scaling processor, the <u>RF</u> communication link communicating output image information in response to the scaled image information generated by the scaling processor.

120. (Amended) A system as set forth in claim 115, further comprising the acts of:

storing at least two digital bits of information in a plurality of levels in each of a plurality of multilevel memory cells;

generating accessed digital information in response to the at least two digital bits of information stored in each of the plurality of multilevel memory cells; and

generating the 64-pixel blocks of spatial<u>ly</u> [interpolation] <u>interpolated image</u> information in response to the accessed digital information.

121. (Amended) A system comprising:

a first memory storing <u>a frame of</u> prior pixel image information, the <u>frame of</u> prior pixel image information representing a prior image;

a second memory storing <u>a frame of</u> next pixel image information, the <u>frame of</u> next pixel image information representing a next image;

<u>a prior vector circuit generating prior vector information in response to the frame of prior pixel image information;</u>

<u>a next vector circuit generating next vector information in response to the frame of next pixel image information; and</u>

a temporal interpolation processor generating <u>a frame of</u> temporally interpolated image information by temporally interpolating [in] between the <u>frame of</u> prior pixel image information and the <u>frame of</u> next pixel image information <u>in response to the prior vector information and in response to the next vector information</u> [; and

a subpixel vector change circuit generating subpixel vector change information having subpixel resolution in response to the prior pixel image information and in response to the next pixel image information].

122. (Amended) A system as set forth in claim 121, further comprising:

an <u>RF</u> communication link communicating output image information in response to the <u>frame of</u> temporally interpolated image information.

123. (Amended) A system comprising:

a first memory storing prior pixel image information, the prior pixel image information representing a prior image;

a second memory storing next pixel image information, the next pixel image information representing a next image;

[a subpixel vector change circuit generating subpixel vector change information having subpixel resolution in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;]

<u>a prior vector circuit generating prior motion vector information in response to the prior pixel image information;</u>

<u>a next vector circuit generating next motion vector information in response to the next pixel image information; and</u>

a transform processor generating [64-sample blocks of] transformed image information in response to the prior [pixel image] <u>motion vector</u> information [stored in the first memory and]<u>,</u> in response to the next [pixel image] <u>motion vector</u> information<u>,</u> [stored in the second memory] <u>in response to the prior pixel image information stored in the first memory, and in response to the next pixel image information stored in the second memory</u> [;

a weight input circuit generating weight input information;

a weight memory;

a writing circuit writing weight information into the weight memory in response to the weight input information; and

a weighting processor generating 64-sample blocks of weighted image information in response to the 64-sample blocks of transformed image information and in response to the weight information stored in the weight memory].

124. (Amended) A system as set forth in claim 123, further comprising:

an <u>RF</u> communication link communicating output image information in response to the [64-sample blocks of weighted] <u>transformed</u> image information.

125. (Amended) A process comprising the acts of:

storing prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;

storing next pixel image information [in a second memory, the next pixel image information] representing a next image;

generating temporally interpolated image information in response to the to the prior pixel image information [stored in the first memory] and in response to the next pixel image information [stored in the second memory]; and

generating transformed image information <u>in response to the temporally interpolated image information,</u> in response to the prior pixel image information [stored in the first memory]<u>,</u> and in response to the next pixel image information [stored in the second memory].

126. (Amended) A process as set forth in claim 125, further comprising the act of:

communicating output image information <u>over an RF data link</u> in response to the transformed image information.

127. (Amended) A process comprising the acts of:

storing prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;

storing next pixel image information [in a second memory, the next pixel image information] representing a next image; and

generating [64-sample blocks of] transformed image information in response to the prior pixel image information and in response to the next pixel image information.

128. (Amended) A process as set forth in claim 127, further comprising the act of:
communicating output image information <u>over an RF data link</u> in response to the [64-sample blocks of] transformed image information.

129. (Amended) A process as set forth in claim 127, further comprising the act of [making a product] <u>generating artificial intelligence information</u> in response to the [64-sample blocks of] transformed image information.

130. (Amended) A process as set forth in claim 125, further comprising the act of making a <u>display</u> product.

131. (Amended) A system comprising:
a memory storing pixel image information;
a subpixel change circuit generating subpixel change information having subpixel resolution by subtracting in response to the pixel image information and in response to feedback information;
a transform processor generating transformed image information in response to the pixel image information;
a scale factor input circuit generating scale factor [input] information;
a scale factor memory;
a writing circuit writing scale factor <u>input</u> information into the scale factor memory <u>in response to the scale factor input information</u>, the scale factor memory storing the scale factor <u>input</u> information;
a scaling processor generating scaled image information in response to the transformed image information and in response to the scale factor <u>input</u> information; and
a feedback processor generating the feedback information in response to the scaled image information.

132. (Amended) A system as set forth in claim 131, further comprising:
a<u>n RF</u> communication link communicating output image information in response to the [transformed] <u>scaled</u> image information.

133. (Amended) A system comprising:
a first memory storing prior pixel image information, the prior pixel image information representing a prior image;
a second memory storing next pixel image information, the next pixel image information representing a next image;
a temporal interpolation processor coupled to the first memory and coupled to the second memory, the temporal interpolation processor generating 64-pixel blocks of temporally interpolated image information in response to the prior pixel image information [stored in the first memory] and in response to the next pixel image information [stored in the second memory]; and
a transform processor coupled to the temporal interpolation processor, the transform processor generating [64-sample blocks of] transformed image information in response to the 64-pixel blocks of temporally interpolated image information generated by the temporal interpolation processor<u>, in response to the prior pixel image information, and in response to the next pixel image information</u>.

134. (Amended) A system as set forth in claim 133, further comprising:
a<u>n RF</u> communication link coupled to the transform processor, the <u>RF</u> communication link communicating output image information in response to the [64-sample blocks of] transformed image information generated by the transform processor.

135. (Amended) A system comprising:
a first frame memory storing <u>a</u> prior frame of image information;
a second frame memory storing <u>a</u> next frame of image information;
a temporal interpolation processor generating a temporally interpolated frame of image information in response to the prior frame of image information and in response to the next frame of image information; and
a transform processor coupled to the temporal interpolation processor, the transform processor generating [a frame of] transformed image information in response to the frame of temporally interpolated image information generated by the temporal interpolation processor<u>, in response to the prior frame of image information, and in response to the next frame of image information</u>.

136. (Amended) A system as set forth in claim 135, further comprising:
a<u>n RF</u> communication link coupled to the transform processor, the <u>RF</u> communication link communicating output image information in response to the [frame of] transformed image information generated by the transform processor.

137. (Amended) A system comprising:
a first memory storing prior pixel image information, the prior pixel image information representing a prior image;
a second memory storing next pixel image information, the next pixel image information representing a next image;
<u>a prior vector circuit generating prior motion vector information in response to the prior pixel image information;</u>
<u>a next vector circuit generating next motion vector information in response to the next pixel image information;</u>
a spatial interpolation circuit generating [64-pixel block of] spatial<u>ly</u> [interpolation] <u>interpolated image</u> information in response to the prior [pixel image] motion vector information [and]<u>,</u> in response to the next [pixel image] <u>motion vector</u> information <u>, in response to the prior pixel image information, and in response to the next pixel image information;</u>
[a subpixel vector change circuit generating subpixel vector change information generated by the subpixel vector change circuit having subpixel resolution in response to the prior pixel image information and in response to the next pixel image information;]
a transform processor generating transformed image information in response to the spatial<u>ly</u> [interpolation] <u>interpolated image</u> information<u>, in response to the prior pixel image information, and in response to the next pixel image information;</u>
a weight input circuit generating weight [input] information;
a weight memory;
a writing circuit writing weight <u>input</u> information into the weight memory in response to the weight [input] information, the weight memory storing the weight <u>input</u> information; and
a weighting processor generating weighted image information in response to the transformed image information and in response to the weight <u>input</u> information stored in the weight memory.

138. (Amended) A system as set forth in claim 137, further comprising:
a<u>n RF</u> communication link communicating output image information in response to the weighted image information.

139. (Amended) A system comprising:
a first memory storing <u>a frame of</u> prior pixel image information, the <u>frame of</u> prior pixel image information representing a prior image;

a second memory storing a frame of next pixel image information, the frame of next pixel image information representing a next image;

a spatial interpolation circuit generating a frame of spatially [interpolation] interpolated image information in response to the frame of prior pixel image information stored in the first memory and in response to the frame of next pixel image information stored in the second memory; and

a subpixel vector change circuit generating subpixel vector change information generated by the subpixel vector change circuit having subpixel resolution in response to the frame of prior pixel image information stored in the first memory and in response to the frame of next pixel image information stored in the second memory [;

a weight circuit generating weight information;

a scale factor circuit generating scale factor information;

a weighting and scaling circuit generating scaled weighted image information in response to the spatial interpolation information, in response to the scale factor information, and in response to the weight information; and

a resolution reduction circuit generating reduced resolution image information in response to the scaled weighted image information].

140. (Amended) A system as set forth in claim 139, further comprising:
an RF communication link communicating output image information in response to the [reduced resolution] frame of spatially interpolated image information.

141. (Amended) A system comprising:
a first memory storing prior pixel image information, the prior pixel image information representing a prior image;
a second memory storing next pixel image information, the next pixel image information representing a next image;
a prior vector circuit generating prior vector information in response to the prior pixel image information;
a next vector circuit generating next vector information in response to the next pixel image information;
[a subpixel vector change circuit generating subpixel vector change information having subpixel resolution in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;]
a weight circuit generating weight information;
a scale factor circuit generating scale factor information; and
a weighting and scaling circuit generating scaled weighted image information in response to the prior [pixel image] vector information [stored in the first memory], in response to the next [pixel image] vector information [stored in the second memory], in response to the scale factor information, [and] in response to the weight information , in response to the prior pixel image information , and in response to the next pixel image information .

142. (Amended) A system as set forth in claim 141, further comprising:
an RF communication link communicating output image information in response to the [weighted] scaled weighted image information.

143. (Amended) A process comprising the acts of:
storing prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;
storing next pixel image information [in a second memory, the next pixel image information] representing a next image;
generating weight information;
generating scale factor information; and
generating [64-sample blocks of] scaled weighted image information in response to the prior pixel image information [stored in the first memory], in response to the next pixel image information [stored in the second memory], in response to the scale factor information, and in response to the weight information.

144. (Amended) A process as set forth in claim 143, further comprising the act of:
communicating output image information over an RF data link in response to the [64-sample blocks of weighted] scaled weighted image information.

145. (Amended) A system comprising:
a first memory storing a frame of prior pixel image information, the frame of prior pixel image information representing a prior image;
a second memory storing a frame of next pixel image information, the frame of next pixel image information representing a next image;
[a weight circuit generating weight information;]
a scale factor input circuit generating scale factor [input] information;
a scale factor memory;
a writing circuit writing scale factor input information into the scale memory in response to the scale factor [input] information; and
a scaling processor generating scaled image information in response to the frame of prior pixel image information, in response to the frame of next pixel image information, and in response to the scale factor input information stored in the scale factor memory.

146. (Amended) A system as set forth in claim 145, further comprising:
an RF communication link communicating output image information in response to the scaled image information.

147. (Amended) A process as set forth in claim 143, further comprising the acts of: [making a product in response to the process set forth in claim 143]
generating data compressed image information in response to the scaled weighted image information;
generating spatially interpolated image information in response to the data compressed image information;
generating temporally interpolated image information in response to the spatially interpolated image information; and
generating the prior pixel image information in response to the temporally interpolated image information.

148. (Amended) A [system] process as set forth in claim [145] 143, further comprising the acts:
[an integrated circuit multilevel memory having a plurality of multilevel memory cells, each of the plurality of multilevel memory cells storing at least two digital bits of information in a plurality of levels;
an integrated circuit multilevel memory accessing circuit generating accessed digital information in response to the at least two digital bits of information stored in each of the plurality of multilevel memory cells; and
the scaling processor generating the scaled image information in response to the accessed digital information generated by the integrated circuit multilevel memory accessing circuit]
generating data compressed image information in response to the transformed image information;
generating transformed image information in response to the data compressed image information; and
generating the prior pixel image information in response to the transformed image information.

150. (Amended) A system as set forth in claim 149, further comprising:
an RF communication link coupled to the weighting and scaling circuit, the RF communication link communicating output image information in response to the scaled weighted image information generated by the weighting and scaling circuit.

151. (Amended) A system comprising:
a first memory storing a frame of prior pixel image information, the frame of prior pixel image information representing a prior image;
a second memory storing a frame of next pixel image information, the frame of next pixel image information representing a next image; and
a spatial interpolation circuit generating a frame of spatially [interpolation] interpolated image information in response to the frame of prior pixel image information stored in the first memory and in response to the frame of next pixel image information stored in the second memory [;
a scale factor input circuit generating scale factor information;
a scale factor memory; and
a scaling processor generating scaled image information in response to the spatial interpolation information and in response to the scale factor information].

152. (Amended) A system as set forth in claim 151, further comprising:
an RF communication link communicating output image information in response to the [scaled] frame of spatially interpolated image information.

153. (Amended) A process comprising the acts of:
storing pixel image information in a memory;
generating spatially [interpolation] interpolated image information in response to the pixel image information and in response to feedback information;
generating weight information;
generating scale factor information;
generating scaled weighted image information in response to the spatially [interpolation] interpolated image information, in response to the scale factor information, and in response to the weight information; and
generating the feedback information in response to the scaled weighted image information.

154. (Amended) A process as set forth in claim 153, further comprising the act of:
communicating output image information over an RF data link in response to the scaled weighted image information.

155. (Amended) A system comprising:
a first memory storing a frame of prior pixel image information, the frame of prior pixel image information representing a prior image;
a second memory storing a frame of next pixel image information, the frame of next pixel image information representing a next image;
a prior vector circuit generating prior vector information in response to the frame of prior pixel image information;
a next vector circuit generating next vector information in response to the frame of next pixel image information; and
a spatial interpolation circuit generating a frame of spatially [interpolation] interpolated image information in response to the prior [pixel image] vector information [and], in response to the next [pixel image] vector information, in response to the frame of prior pixel image information, and in response to the frame of next pixel image information [;
a subpixel vector change circuit generating subpixel vector change information generated by the subpixel vector change circuit having subpixel resolution in response to the prior pixel image information and in response to the next pixel image information;
a weight circuit generating weight information; and
a weighting circuit coupled to the weight circuit and coupled to the spatial interpolation circuit, the weighting circuit generating weighted image information in response to the spatial interpolation information generated by the spatial interpolation circuit and in response to the weight information generated by the weight circuit].

156. (Amended) A system as set forth in claim 155, further comprising:
an RF communication link coupled to the weighting circuit, the RF communication link communicating output image information in response to the [weighted image information generated by the weighting circuit] frame of spatially interpolated image information.

158. (Amended) A process as set forth in claim 157, further comprising the act of:
communicating output image information over an RF data link in response to the scaled weighted image information.

159. (Amended) A system comprising:
a first memory storing a frame of prior pixel image information, the frame of prior pixel image information representing a prior image;
a second memory storing a frame of next pixel image information, the frame of next pixel image information representing a next image; and
a transform processor generating transformed image information in response to the frame of prior pixel image information stored in the first memory and in response to the frame of next pixel image information stored in the second memory [;
a weight circuit generating weight information;
a scale factor circuit generating scale factor information; and
a weighting and scaling circuit generating scaled weighted image information in response to the transformed image information, in response to the scale factor information, and in response to the weight information].

160. (Amended) A system as set forth in claim 159, further comprising:
an RF communication link communicating output image information in response to the [scaled weighted] transformed image information.

162. (Amended) A process as set forth in claim 161, further comprising the act of:
communicating output image information over an RF data link in response to the scaled weighted image information.

163. (Amended) A system comprising:
a first memory storing prior pixel image information, the prior pixel image information representing a prior image;
a second memory storing next pixel image information, the next pixel image information representing a next image;
a subpixel vector change circuit generating subpixel vector change information having subpixel resolution in response to the prior pixel image information and in response to the next pixel image information; and
a transform processor generating [64-sample blocks of] transformed image information in response to the prior pixel image information and in response to the next pixel image information [;
a weight circuit generating weight information;
a scale factor input circuit generating scale factor input information;
a scale factor memory;
a writing circuit writing scale factor information into the scale factor memory in response to the scale factor input information, the scale factor memory storing the scale factor information; and
a weighting and scaling circuit generating 64-sample blocks of scaled weighted image information in response to the 64-sample blocks of transformed image information, in response to the scale factor information stored in the scale factor memory, and in response to the weight information].

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164. (Amended) A system as set forth in claim 163, further comprising:

an RF communication link communicating output image information in response to the [64-sample blocks of scaled weighted] transformed image information.

165. (Amended) A process comprising the acts of:

storing pixel image information in a memory;

generating spatially [interpolation] interpolated image information in response to the pixel image information stored in the memory and in response to feedback information;

generating transformed image information in response to the spatially [interpolation] interpolated image information;

generating weight information;

generating scale factor information;

generating scaled weighted image information in response to the transformed image information, in response to the scale factor information, and in response to the weight information; and

generating the feedback information in response to the scaled weighted image information.

166. (Amended) A process as set forth in claim 165, further comprising the acts of: [making a product in response to the scaled weighted image information]

generating data compressed image information in response to the scaled weighted image information;

generating second transformed image information in response to the data compressed image information; and

generating the feedback image information in response to the second transformed image information.

167. (Amended) A system comprising:

a first memory storing prior pixel image information, the prior pixel image information representing a prior image;

a second memory storing next pixel image information, the next pixel image information representing a next image;

a spatial interpolation circuit generating spatially [interpolation] interpolated image information in response to prior pixel image information and in response to next pixel image information; and

a transform processor coupled to the spatial interpolation circuit, the transform processor generating transformed image information in response to the spatially [interpolation] interpolated image information generated by the spatial interpolation circuit , in response to prior pixel image information, and in response to next pixel image information [;

a weight circuit generating weight information; and

a weighting circuit coupled to the weight circuit and coupled to the transform processor, the weighting circuit generating weighted image information in response to the transformed image information generated by the transform processor and in response to the weight information generated by the weight circuit].

168. (Amended) A system as set forth in claim 167, further comprising:

an RF communication link coupled to the weighting circuit, the RF communication link communicating output image information in response to the [weighted] transformed image information generated by the weighting circuit.

169. (Amended) A system comprising:

a first memory storing a frame of prior pixel image information, the frame of prior pixel image information representing a prior image;

a second memory storing a frame of next pixel image information, the frame of next pixel image information representing a next image;

a spatial interpolation circuit generating a frame of spatially [interpolation] interpolated image information in response to the frame of prior pixel image information and in response to the frame of next pixel image information;

a subpixel vector change circuit generating subpixel vector change information having subpixel resolution in response to the frame of prior pixel image information and in response to the frame of next pixel image information; and

a transform processor generating transformed image information in response to the frame of spatially [interpolation] interpolated image information, in response to the frame of prior pixel image information, and in response to the frame of next pixel image information [;

a weight circuit generating weight information;

a scale factor input circuit generating scale factor input information;

a scale factor memory;

a writing circuit writing scale factor information into the scale factor memory in response to the scale factor input information; and

a weighting and scaling circuit generating scaled weighted image information in response to the transformed image information, in response to the scale factor information stored in the scale factor memory, and in response to the weight information].

170. (Amended) A system as set forth in claim 169, further comprising:

an RF communication link communicating output image information in response to the [scaled weighted] transformed image information.

171. (Amended) A process comprising the acts of:

storing prior pixel image information [in a first memory], the prior pixel image information representing a prior image;

storing next pixel image information [in a second memory], the next pixel image information representing a next image;

generating prior motion vector information in response to the prior pixel image information;

generating next motion vector information in response to the next pixel image information;

generating 64-pixel blocks of spatially [interpolation] interpolated image information in response to the prior [pixel image] motion vector information [stored in the first memory and] , in response to the next [pixel image] motion vector information , in response to the prior pixel image information, and in response to the next pixel image information [stored in the second memory];

[generating subpixel vector change information having subpixel resolution in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;] and

generating [64-sample blocks of] transformed image information in response to the 64-pixel blocks of spatially [interpolation] interpolated image information, in response to the prior pixel image information, and in response to the next pixel image information [;

generating weight input information;

generating scale factor information;

writing weight information into a weight memory in response to the weight input information;

storing the weight information in the weight memory;

generating 64-sample blocks of scaled weighted image information in response to the 64-sample blocks of transformed image information, in response to the scale factor information, and in response to the weight information stored in the weight memory; and

generating 64-sample blocks of reduced resolution image information in response to the 64-sample blocks of scaled weighted image information].

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172. (Amended) A process as set forth in claim 171, further comprising the act of:
   communicating output image information over an RF data link in response to the [64-sample blocks of reduced resolution] transformed image information.

173. (Amended) A process as set forth in claim 171, further comprising the acts of: [making a product]
   generating data compressed image information in response to the transformed image information;
   generating second spatially interpolated image information in response to the data compressed image information;
   generating temporally interpolated image information in response to the second spatially interpolated image information; and
   generating the prior pixel image information in response to the temporally interpolated image information.

187. (Amended) A process comprising the acts of:
   storing prior pixel image information [in a first memory], the prior pixel image information representing a prior image;
   storing next pixel image information [in a second memory], the next pixel image information representing a next image;
   generating prior vector information in response to the prior pixel image information;
   generating next vector information in response to the next pixel image information;
   generating 64-pixel blocks of spatially [interpolation] interpolated image information in response to the prior [pixel image] vector information [stored in the first memory and] , in response to the next [pixel image] vector information [stored in the second memory] , in response to the prior pixel image information, and in response to the next pixel image information;
   [generating subpixel vector change information having subpixel resolution in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;] and
   generating [64-sample blocks of] transformed image information in response to the 64-pixel blocks of spatially [interpolation] interpolated image information, in response to the prior pixel image information, and in response to the next pixel image information.

188. (Amended) A process as set forth in claim 187, further comprising the act of:
   communicating output image information over an RF data link in response to the [64-sample blocks of] transformed image information.

189. (Amended) A process as set forth in claim 187, further comprising the acts of:
   [making a product in response to the process set forth in claim 187]
   storing weight information;
   storing scale factor information;
   generating scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the transformed image information; and
   generating the prior pixel image information in response to the scaled weighted image information.

190. (Amended) A process comprising the acts of:
   storing pixel image information in a memory; [;]
   generating spatially [interpolation] interpolated image information in response to the pixel image information stored in the memory;
   generating subpixel change image information having subpixel resolution by subtracting in response to the pixel image information stored in the memory and in response to feedback information; and
   generating the feedback information in response to the subpixel change image information.

191. (Amended) A process as set forth in claim 190, further comprising the act of:
   communicating output image information in response to the spatially interpolated image information.

192. (Amended) A process as set forth in claim 190, further comprising the acts of:
   [making a product in response to the process set forth in claim 190]
   generating data compressed image information in response to the spatially interpolated image information;
   generating transformed image information in response to the data compressed image information; and
   generating the feedback image information in response to the transformed image information.

194. (Amended) A process as set forth in claim 193, further comprising the act of:
   communicating output image information over an RF data link in response to the pixel image information stored in the memory.

195. (Amended) A process as set forth in claim [193] 190, further comprising the acts of: [making a product in response to the delta subpixel image information]
   generating data compressed image information in response to the spatially interpolated image information;
   storing weight information;
   storing scale factor information;
   generating scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the data compressed image information;
   generating transformed image information in response to the scaled weighted image information;
   generating second spatially interpolated image information in response to the transformed image information;
   generating temporally interpolated image information in response to the second spatially interpolated image information; and
   generating the feedback image information in response to the temporally interpolated image information.

196. (Amended) A process as set forth in claim 193, further comprising the acts of:
   [storing at least two digital bits of information in a plurality of levels in each of a plurality of multilevel memory cells;
   generating accessed digital information in response to the at least two digital bits of information stored in each of the plurality of multilevel memory cells; and
   generating the delta subpixel image information in response to the accessed digital information]
   generating transformed image information in response to the pixel image information; and
   generating the feedback image information in response to the transformed image information.

197. (Amended) A process as set forth in claim [187] 193, further comprising the acts of:
   [storing at least two digital bits of information in a plurality of levels in each of a plurality of multilevel memory cells;
   generating accessed digital information in response to the at least two digital bits of information stored in each of the plurality of multilevel memory cells; and
   generating the 64-sample blocks of transformed image information in response to the accessed digital information]

storing weight information;
storing scale factor information;
generating scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the pixel image information;
generating transformed image information in response to the scaled weighted image information;
generating spatially interpolated image information in response to the transformed image information;
generating temporally interpolated image information in response to the spatially interpolated image information; and
generating the feedback image information in response to the temporally interpolated image information.

199. (Amended) A process as set forth in claim 198, further comprising the act of:
communicating output image information over an RF data link in response to the [subpixel difference] pixel image information.

200. (Amended) A process as set forth in claim 198, further comprising the acts of:
[making a product in response to the process set forth in claim 198]
generating data compressed image information in response to the pixel image information;
storing weight information;
storing scale factor information;
generating scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the data compressed image information;
generating transformed image information in response to the scaled weighted image information;
generating spatially interpolated image information in response to the transformed image information;
generating temporally interpolated image information in response to the spatially interpolated image information; and
generating the feedback image information in response to the temporally interpolated image information.

201. (Amended) A process comprising the acts of:
storing pixel image information in a memory;
generating 64-pixel blocks of spatially [interpolation] interpolated image information in response to the pixel image information stored in the memory and in response to feedback information;
generating weight [input] information;
writing weight input information into a weight memory in response to the weight [input] information;
storing the weight input information in the weight memory;
generating [64-sample blocks of] weighted image information in response to the 64-pixel blocks of spatially [interpolation] interpolated image information and in response to the weight input information stored in the weight memory; and
generating the feedback information in response to the [64-sample blocks of] weighted image information.

202. (Amended) A process as set forth in claim 201, further comprising the act of:
communicating output image information over an RF data link in response to the [64-pixel blocks of spatial interpolation] weighted image information.

203. (Amended) A process as set forth in claim 201, further comprising the acts of:
[making a product]
generating data compressed image information in response to the scaled weighted image information;
generating transformed image information in response to the data compressed image information; and
generating the feedback image information in response to the transformed image information.

204. (Amended) A process comprising the acts of:
storing prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;
storing next pixel image information [in a second memory, the next pixel image information] representing a next image;
generating 64-pixel blocks of spatially [interpolation] interpolated image information in response to the prior pixel image information and in response to the next pixel image information;
generating scale factor [input] information;
writing scale factor input information into a [scale] memory in response to the scale factor [input]information;
storing the scale factor input information in the [scale] memory; and
generating [64-sample blocks of] scaled image information in response to the 64-pixel blocks of spatially [interpolation] interpolated image information and in response to the scale factor input information stored in the [scale] memory.

205. (Amended) A process as set forth in claim 204, further comprising the act of:
communicating output image information over an RF data link in response to the [64-pixel blocks of spatial interpolation] scaled image information.

206. (Amended) A process as set forth in claim 204, further comprising the acts of: [making a product]
generating data compressed image information in response to the scaled image information;
generating temporally interpolated image information in response to the data compressed image information; and
generating the prior pixel image information in response to the temporally interpolated image information.

207. (Amended) A process as set forth in claim 204, further comprising the acts of:
storing at least two digital bits of information in a plurality of levels in each of a plurality of multilevel memory cells;
generating accessed digital information in response to the at least two digital bits of information stored in each of the plurality of multilevel memory cells; and
generating the 64-pixel blocks of spatially [interpolation] interpolated image information in response to the accessed digital information.

208. (Amended) A process as set forth in claim 204, further comprising the act of:
making a manufactured product in response to the 64-pixel blocks of spatially [interpolation] interpolated image information.

209. (Amended) A process comprising the acts of:
storing prior pixel image information [in a first memory], the prior pixel image information representing a prior image;
storing next pixel image information [in a second memory], the next pixel image information representing a next image;
generating prior motion vector information in response to the prior pixel image information;

generating next motion vector information in response to the next pixel image information; and

generating 64-pixel blocks of spatial<u>ly</u> [interpolation] <u>interpolated image</u> information in response to the prior [pixel image] <u>motion vector</u> information [and]<u>,</u> in response to the next [pixel image] <u>motion vector</u> information [; and

generating subpixel vector change information having subpixel resolution] in response to the prior pixel image information<u>,</u> and in response to the next pixel image information.

210. (Amended) A process as set forth in claim 209, further comprising the act of:

communicating output image information <u>over an RF data link</u> in response to the 64-pixel blocks of spatial<u>ly</u> [interpolation] <u>interpolated image</u> information.

211. (Amended) A process as set forth in claim 209, further comprising the act<u>s</u> of:

[making a product in response to the 64-pixel blocks of spatial interpolation information]

<u>generating data compressed 64-pixel blocks of image information in response to the 64-pixel blocks of spatially interpolated image information;</u>

<u>storing weight information;</u>

<u>storing scale factor information;</u>

<u>generating 64-pixel blocks of scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the data compressed 64-pixel blocks of image information; and</u>

<u>generating the prior pixel image information in response to the 64-pixel blocks of scaled weighted image information.</u>

212. (Amended) A process comprising the acts of:

storing a prior 64-pixel block of image information [in a first memory], the prior 64-pixel block of image information representing a prior image;

storing a next 64-pixel block of image information [in a second memory], the next 64-pixel block of image information representing a next image;

<u>generating prior motion vector information in response to the prior 64-pixel block of image information;</u>

<u>generating next motion vector information in response to the next 64-pixel block of image information;</u>

generating a temporally interpolated 64-pixel block of image information by temporally interpolating in response to the prior [64-pixel block of image] <u>motion vector</u> information [stored in the first memory and]<u>,</u> in response to the next [64-pixel block of image] <u>motion vector</u> information [stored in the second memory]<u>, in response to the prior 64-pixel block of image information, and in response to the next 64-pixel block of image information;</u>

[generating subpixel vector change information having subpixel resolution in response to the prior 64-pixel block of image information stored in the first memory and in response to the next 64-pixel block of image information stored in the second memory;] and

generating [64-sample blocks of] transformed image information in response to the [prior 64-pixel block of image information stored in the first memory and in response to the next] <u>temporally interpolated</u> 64-pixel block of image information [stored in the second memory] <u>, in response to the prior 64-pixel block of image information, and in response to the next 64-pixel block of image information.</u>

213. (Amended) A process as set forth in claim 212, further comprising the act of:

communicating output image information <u>over an RF data link</u> in response to the [64-sample blocks of] transformed image information.

214. (Amended) A process as set forth in claim 212, further comprising the act<u>s</u> of:

[making a product in response to the 64-sample blocks of transformed image information]

<u>generating data compressed 64-pixel blocks of image information in response to the 64-pixel blocks of transformed image information;</u>

<u>storing weight information;</u>

<u>storing scale factor information;</u>

<u>generating 64-pixel blocks of scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the data compressed 64-pixel blocks of image information; and</u>

<u>generating the prior 64-pixel block of image information in response to the 64-pixel blocks of scaled weighted image information.</u>

216. (Amended) A process as set forth in claim 215, further comprising the act of:

communicating output image information <u>over an RF data link</u> in response to the pixel image information stored in the memory.

217. (Amended) A process as set forth in claim 215, further comprising the act<u>s</u> of:

[making a product]

<u>generating data compressed image information in response to the transformed image information;</u>

<u>storing weight information;</u>

<u>storing scale factor information;</u>

<u>generating scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the data compressed image information;</u>

<u>generating second transformed image information in response to the scaled weighted image information;</u>

<u>generating spatially interpolated image information in response to the second transformed image information;</u>

<u>generating temporally interpolated image information in response to the of spatially interpolated image information; and</u>

<u>generating the feedback image information in response to the temporally interpolated image information.</u>

218. (Amended) A process comprising the acts of:

storing pixel image information in a memory;

generating transformed image information in response to pixel image information and in response to feedback information;

generating scale factor [input] information;

writing scale factor <u>input</u> information into a scale memory in response to the scale factor [input] information;

storing the scale factor <u>input</u> information in the scale memory;

generating scaled image information in response to the transformed image information and in response to the scale factor <u>input</u> information stored in the scale memory; and

generating the feedback information in response to the scaled image information.

219. (Amended) A process as set forth in claim 218, further comprising the act<u>s</u> of<u>:</u> [making a product in response to the transformed image information]

<u>generating data compressed image information in response to the scaled image information;</u>

<u>generating scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the data compressed image information;</u>

<u>generating second transformed image information in response to the scaled weighted image information;</u>

<u>generating second spatially interpolated image information in response to the second transformed image information;</u>

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generating temporally interpolated image information in response to the second spatially interpolated image information; and
generating the feedback image information in response to the temporally interpolated image information.

220. (Amended) A process as set forth in claim 218, further comprising the act of:
communicating output image information over an RF data link in response to the [transformed] scaled image information.

223. (Amended) A process comprising the acts of:
storing prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;
storing next pixel image information [in a second memory, the next pixel image information] representing a next image;
generating subpixel vector change information having subpixel resolution in response to the prior pixel image information and in response to the next pixel image information; and
generating [64-sample blocks of] transformed image information in response to the prior pixel image information and in response to the next pixel image information.

224. (Amended) A process as set forth in claim 223, further comprising the act of:
communicating output image information over an RF data link in response to the [64-sample blocks of] transformed image information.

225. (Amended) A process as set forth in claim 223, further comprising the acts of:
[making a product in response to the 64-sample blocks of transformed image information]
generating data compressed image information in response to the transformed image information;
storing scale factor information;
generating scaled image in response to the scale factor information and in response to the data compressed image information; and
generating the prior pixel image information in response to the scaled image information.

226. (Amended) A process comprising the acts of:
storing a frame of prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;
storing a frame of next pixel image information [in a second memory, the next pixel image information] representing a next image;
generating a frame of spatially [interpolation] interpolated image information in response to the frame of prior pixel image information [stored in the first memory] and in response to the frame of next pixel image information [stored in the second memory]; and
generating transformed image information in response to the frame of spatially [interpolation] interpolated image information, in response to the frame of prior pixel image information, and in response to the frame of next pixel image information.

227. (Amended) A process as set forth in claim 226, further comprising the act of:
communicating output image information over an RF data link in response to the [spatial interpolation] transformed image information.

228. (Amended) A process as set forth in claim 226, further comprising the acts of:
[making a product]
storing weight information;
storing scale factor information;
generating scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the transformed image information; and
generating the frame of prior pixel image information in response to the scaled weighted image information.

229. (Amended) A process comprising the acts of:
storing prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;
storing next pixel image information [in a second memory, the next pixel image information] representing a next image;
generating 64-pixel blocks of spatially [interpolation] interpolated image information in response to the prior pixel image information and in response to the next pixel image information; and
generating [64-sample blocks of] transformed image information in response to the 64-pixel blocks of spatially [interpolation] interpolated image information, in response to the prior pixel image information, and in response to the next pixel image information.

230. (Amended) A process as set forth in claim 229, further comprising the act of:
communicating output image information over an RF data link in response to the [64-sample blocks of] transformed image information.

231. (Amended) A process as set forth in claim 229, further comprising the acts of:
[making a product in response to the 64-sample blocks of transformed image information]
storing weight information;
generating weighted image information in response to the weight information and in response to the transformed image information; and
generating the prior pixel image information in response to the weighted image information.

232. (Amended) A process comprising the acts of:
storing pixel image information in a memory;
generating 64-pixel blocks of spatially [interpolation] interpolated image information in response to the pixel image information;
generating delta subpixel information having subpixel resolution in response to the pixel image information and in response to feedback information;
generating [64-sample blocks of] transformed image information in response to 64-pixel blocks of spatially [interpolation] interpolated image information; and
generating the feedback information in response to the [64-sample blocks of] transformed image information.

233. (Amended) A process as set forth in claim 232, further comprising the act of:
communicating output image information over an RF data link in response to the [64-sample blocks of] transformed image information.

234. (Amended) A process as set forth in claim [232] 223, further comprising the acts of:
[making a product in response to the 64-sample blocks of transformed image information]
generating data compressed image information in response to the transformed image information;
generating spatially interpolated image information in response to the data compressed image information;

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generating temporally interpolated image information in response to the spatially interpolated image information; and
generating the prior pixel image information in response to the temporally interpolated image information.

235. (Amended) A process comprising the acts of:
storing prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;
storing next pixel image information [in a second memory, the next pixel image information] representing a next image;
generating prior motion vector information in response to the prior pixel image information;
generating next motion vector information in response to the next pixel image information; and
generating spatially [interpolation] interpolated image information in response to the prior pixel image information [stored in the first memory and], in response to the next pixel image information, [stored in the second memory;
generating subpixel vector change information having subpixel resolution] in response to the prior [pixel image] motion vector information [stored in the first memory] and in response to the next [pixel image] motion vector information [stored in the second memory;
generating weight input information;
generating scale factor information;
writing weight information into a weight memory in response to the weight input information;
storing the weight information in the weight memory; and
generating scaled weighted image information in response to the spatial interpolation information, in response to the scale factor information, and in response to the weight information stored in the weight memory].

236. (Amended) A process as set forth in claim 235, further comprising the act of:
communicating output image information over an RF data link in response to the [scaled weighted] spatially interpolated image information.

237. (Amended) A process as set forth in claim 235, further comprising the acts of:
[making a product in response to the scaled weighted image information]
storing weight information;
storing scale factor information;
generating scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the spatially interpolated image information; and
generating the prior pixel image information in response to the scaled weighted image information.

238. (Amended) A process comprising the acts of:
storing a frame of prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;
storing a frame of next pixel image information [in a second memory, the next pixel image information] representing a next image;
generating subpixel vector change information having subpixel resolution in response to the frame of prior pixel image information [stored in the first memory] and in response to the frame of next pixel image information [stored in the second memory];
generating weight information; and
generating weighted image information in response to the frame of prior pixel image information [stored in the first memory], in response to the frame of next pixel image information [stored in the second memory], and in response to the weight information.

239. (Amended) A process as set forth in claim 238, further comprising the act of:
communicating output image information over an RF data link in response to the [scaled] weighted image information.

240. (Amended) A process as set forth in claim 238, further comprising the acts of:
[making a product in response to the scaled image information]
generating spatially interpolated image information in response to the weighted image information;
generating temporally interpolated image information in response to the spatially interpolated image information; and
generating the frame of prior pixel image information in response to the temporally interpolated image information.

241. (Amended) A process comprising the acts of:
storing prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;
storing next pixel image information [in a second memory, the next pixel image information] representing a next image;
generating weight [input] information;
generating scale factor information;
writing weight input information into a [weight] memory in response to the weight [input] information;
storing the weight input information in the [weight] memory; and
generating scaled weighted image information in response to the prior pixel image information [stored in the first memory], in response to the next pixel image information [stored in the second memory], in response to the scale factor information, and in response to the weight input information [stored in the weight memory].

242. (Amended) A process as set forth in claim 241, further comprising the act of:
communicating output image information over an RF data link in response to the scaled weighted image information.

243. (Amended) A process as set forth in claim 241, further comprising the acts of:
[making a product in response to the scaled weighted image information]
generating spatially interpolated image information in response to the scaled weighted image information;
generating temporally interpolated image information in response to the spatially interpolated image information; and
generating the prior pixel image information in response to the temporally interpolated image information.

244. (Amended) A process comprising the acts of:
storing a prior 64-pixel block of pixel image information [in a first memory];
storing a next 64-pixel block of pixel image information [in a second memory]; and
generating a temporally interpolated 64-pixel block of image information by temporally interpolating [in] between the prior 64-pixel block of pixel image information and the next 64-pixel block of pixel image information [,;
generating weight information;
generating scale factor information; and

generating 64-sample blocks of scaled weighted image information in response to the prior 64-pixel block of pixel image information, in response to the next 64-pixel block of pixel image information, in response to the scale factor information, and in response to the weight information].

245. (Amended) A process as set forth in claim 244, further comprising the act of:

communicating output image information over an RF data link in response to the temporally interpolated 64-[sample]pixel [blocks] block of [scaled weighted] image information.

246. (Amended) A process as set forth in claim 244, further comprising the acts of: [making a disk product in response to the 64 sample blocks of scaled weighted image information]

storing weight information;

storing scale factor information;

generating a 64-pixel block of scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the temporally interpolated 64-pixel block of image information; and

generating the prior 64-pixel block of image information in response to the 64-pixel block of scaled weighted image information.

247. (Amended) A process as set forth in claim 244, further comprising the acts of:

[making a computer aided design product; and

making a second product in response to the computer aided design product]

generating a spatially interpolated 64-pixel block of image information in response to the temporally interpolated 64-pixel block of image information;

generating a second temporally interpolated 64-pixel block of image information in response to the spatially interpolated 64-pixel block of image information; and

generating the prior 64-pixel block of image information in response to the second temporally interpolated 64-pixel block of image information.

248. (Amended) A [process] system as set forth in claim [244] 105, [further comprising the act of:

making a product]

wherein the prior motion vector information includes prior frame horizontal-axis motion vector information and prior frame vertical-axis motion vector information; and

wherein the next motion vector information includes next frame horizontal-axis motion vector information and next frame vertical-axis motion vector information.

249. (Amended) A process comprising the acts of:

storing a frame of prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;

storing a frame of next pixel image information [in a second memory, the next pixel image information] representing a next image;

generating prior vector information in response to the frame of prior pixel image information;

generating next vector information in response to the frame of next pixel image information;

[generating subpixel vector change information having subpixel resolution in response to the prior pixel image information and in response to the next pixel image information;]

generating weight [input] information;

generating scale factor information;

writing weight input information into a [weight] memory in response to the weight [input] information;

storing the weight input information in the [weight] memory;

generating scaled weighted image information in response to the frame of prior pixel image information, in response to the frame of next pixel image information, in response to the scale factor information, [and] in response to the weight input information stored in the [weight] memory, in response to the prior vector information, and in response to the next vector information; and

generating reduced resolution image information in response to the scaled weighted image information.

250. (Amended) A process as set forth in claim 249, further comprising the act of:

communicating output image information over an RF data link in response to the [scaled weighted] reduced resolution image information.

251. (Amended) A process as set forth in claim 249, further comprising the acts of:

[making a product in response to the process set forth in claim 249]

generating data compressed image information in response to the reduced resolution image information;

generating transformed image information in response to the data compressed image information; and

generating the frame of prior pixel image information in response to the transformed image information.

252. (Amended) A process comprising the acts of:

storing prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;

storing next pixel image information [in a second memory, the next pixel image information] representing a next image; and

generating spatially [interpolation] interpolated image information in response to the prior pixel image information [stored in the first memory] and in response to the next pixel image information [stored in the second memory;

generating weight input information;

generating scale factor information;

writing weight information into a weight memory in response to the weight input information;

storing the weight information in the weight memory; and

generating scaled weighted image information in response to the spatial interpolation information, in response to the scale factor information, and in response to the weight information stored in the weight memory].

253. (Amended) A process as set forth in claim 252, further comprising the act of:

communicating output image information over an RF data link in response to the [scaled weighted] spatially interpolated image information.

254. (Amended) A process as set forth in claim 252, further comprising the act of:

[making a product in response to the scaled weighted image information]

storing weight information;

generating weighted image information in response to the weight information and in response to the spatially interpolated image information; and

generating the prior pixel image information in response to the weighted image information.

255. (Amended) A process comprising the acts of:
    storing prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;
    storing next pixel image information [in a second memory, the next pixel image information] representing a next image; and
    generating 64-pixel blocks of spatial<u>ly</u> [interpolation] <u>interpolated image</u> information in response to the prior pixel image information and in response to the next pixel image information [;
    generating weight input information;
    generating scale factor information;
    writing weight information into a weight memory in response to the weight input information;
    storing the weight information in the weight memory; and
    generating 64-sample blocks of scaled weighted image information in response to the 64-pixel blocks of spatial interpolation information, in response to the scale factor information, and in response to the weight information stored in the weight memory].

256. (Amended) A process as set forth in claim 255, further comprising the act of:
    communicating output image information <u>over an RF data link</u> in response to the [64-sample blocks of scaled weighted] <u>64-pixel blocks of spatially interpolated</u> image information.

257. (Amended) A process as set forth in claim 255, further comprising the act<u>s</u> of:
    <u>storing weight information;</u>
    <u>storing scale factor information;</u>
[making a product in response to the] <u>generating</u> 64-[sample]<u>pixel</u> blocks of scaled weighted image information <u>in response to the weight information, in response to the scale factor information, and in response to the 64-pixel blocks of spatially interpolated image information; and</u>
    <u>generating the prior pixel image information in response to the 64-pixel blocks of scaled weighted image information.</u>

258. (Amended) A process comprising the acts of:
    storing <u>a frame of</u> prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;
    storing <u>a frame of</u> next pixel image information [in a second memory, the next pixel image information] representing a next image;
    <u>generating prior motion vector information in response to the frame of prior pixel image information;</u>
    <u>generating next motion vector information in response to the frame of next pixel image information; and</u>
    generating <u>a frame of</u> spatial<u>ly</u> [interpolation] <u>interpolated image</u> information in response to the <u>frame of</u> prior pixel image information [and]<u>,</u> in response to the <u>frame of</u> next pixel image information [;
    generating subpixel vector change information having subpixel resolution]<u>,</u> in response to the prior [pixel image] <u>motion vector</u> information<u>,</u> and in response to the next [pixel image] <u>motion vector</u> information [;
    generating weight information;
    generating scale factor information; and
    generating scaled weighted image information in response to the spatial interpolation information, in response to the scale factor information, and in response to the weight information].

259. (Amended) A process as set forth in claim 258, further comprising the act of:
    communicating output image information <u>over an RF data link</u> in response to the [scaled weighted] <u>frame of spatially interpolated</u> image information.

260. (Amended) A process as set forth in claim 258, further comprising the act<u>s</u> of:
    [making a product in response to the scaled weighted image information]
    <u>generating a data compressed frame of image information in response to the frame of spatially interpolated image information;</u>
    <u>generating a frame of transformed image information in response to the data compressed frame of image information; and</u>
    <u>generating the frame of prior pixel image information in response to the frame of transformed image information.</u>

261. (Amended) A process comprising the acts of:
    storing prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;
    storing next pixel image information [in a second memory, the next pixel image information] representing a next image;
    generating subpixel vector change information having subpixel resolution in response to the prior pixel image information [stored in the first memory] and in response to the next pixel image information [stored in the second memory]; <u>and</u>
    generating transformed image information in response to the prior pixel image information [stored in the first memory] and in response to the next pixel image information [stored in the second memory;
    generating weight input information;
    generating scale factor information;
    writing weight information into a weight memory in response to the weight input information;
    storing the weight information in the weight memory; and
    generating scaled weighted image information in response to the transformed image information, in response to the scale factor information, and in response to the weight information stored in the weight memory].

262. (Amended) A process as set forth in claim 261, further comprising the act of:
    communicating output image information <u>over an RF data link</u> in response to the [scaled weighted] <u>transformed</u> image information.

263. (Amended) A process as set forth in claim 261, further comprising the act<u>s</u> of:
    [making a product in response to the scaled weighted image information]
    <u>generating data compressed image information in response to the transformed image information;</u>
    <u>generating second transformed image information in response to the data compressed image information; and</u>
    <u>generating the prior pixel image information in response to the second transformed image information.</u>

264. (Amended) A process comprising the acts of:
    storing <u>a frame of</u> prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;
    storing <u>a frame of</u> next pixel image information [in a second memory, the next pixel image information] representing a next image; <u>and</u>
    generating transformed image information in response to the <u>frame of</u> prior pixel image information [stored in the first memory] and in response to the <u>frame</u> of next pixel image information [stored in the second memory;

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generating weight information; and
generating weighted image information in response to the transformed image information and in response to the weight information;].

265. (Amended) A process as set forth in claim 264, further comprising the act of:
communicating output image information over an RF data link in response to the [weighted] transformed image information.

266. (Amended) A [process] system as set forth in claim [264] 107, [further comprising the act of:
making a product in response to the weighted image information]
wherein the prior motion vector information includes prior frame first field horizontal-axis motion vector information, prior frame first field vertical-axis motion vector information, prior frame second field horizontal-axis motion vector information, and prior frame second field vertical-axis motion vector information; and
wherein the next motion vector information includes next frame first field horizontal-axis motion vector information, next frame first field vertical-axis motion vector information, next frame second field horizontal-axis motion vector information, and next frame second field vertical-axis motion vector information.

267. (Amended) A process comprising the acts of:
storing prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;
storing next pixel image information [in a second memory, the next pixel image information] representing a next image; and
generating [64-sample blocks of] transformed image information in response to the prior pixel image information and in response to the next pixel image
information [;
generating weight input information;
generating scale factor information;
writing weight information into a weight memory in response to the weight input information;
storing the weight information in the weight memory; and
generating 64-sample blocks of scaled weighted image information in response to the 64-sample blocks of transformed image information, in response to the scale factor information, and in response to the weight information stored in the weight memory].

268. (Amended) A process as set forth in claim 267, further comprising the act of:
communicating output image information over an RF data link in response to the [64-sample blocks of scaled weighted] transformed image information.

269. (Amended) A process as set forth in claim 267, further comprising the acts of:
[making a product in response to the 64-sample blocks of scaled weighted image information]
generating data compressed image information in response to the transformed image information;
storing weight information;
storing scale factor information;
generating scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the data compressed image information;
generating second transformed image information in response to the scaled weighted image information;
generating spatially interpolated image information in response to the second transformed image information;
generating temporally interpolated image information in response to the spatially interpolated image information; and
generating the prior pixel image information in response to the temporally interpolated image information.

271. (Amended) A process as set forth in claim 270, further comprising the act of:
communicating output image information over an RF data link in response to the scaled weighted image information.

272. (Amended) A process as set forth in claim 270, further comprising the acts of:
[making a product in response to the scaled weighted image information]
generating data compressed image information in response to the transformed image information;
generating scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the data compressed image information;
generating second transformed image information in response to the scaled weighted image information;
generating spatially interpolated image information in response to the second transformed image information;
generating temporally interpolated image information in response to the spatially interpolated image information; and
generating the feedback information in response to the temporally interpolated image information.

273. (Amended) A process comprising the acts of:
storing prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;
storing next pixel image information [in a second memory, the next pixel image information] representing a next image;
generating 64-pixel blocks of spatially [interpolation] interpolated image information in response to the prior pixel image information [stored in the first
memory] and in response to the next pixel image information [stored in the second memory];
generating [64-sample blocks of] transformed image information in response to 64-pixel blocks of spatially [interpolation] interpolated image information, in
response to the prior pixel image information, and in response to the next pixel image information;
generating weight [input] information;
generating scale factor information;
writing weight input information into a [weight] memory in response to the weight [input] information;
storing the weight input information in the [weight] memory; and
generating [64-sample blocks of] scaled weighted image information in response to the [64-sample blocks of] transformed image information, in response to
the scale factor information, and in response to the weight input information stored in the [weight] memory.

274. (Amended) A process as set forth in claim 273, further comprising the act of:
communicating output image information over an RF data link in response to the [64-sample blocks of] scaled weighted image information.

275. (Amended) A process as set forth in claim 273, further comprising the acts of:
[making a product in response to the 64-sample blocks of scaled weighted image information]
generating data compressed image information in response to the scaled weighted image information;
generating second scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the
data compressed image information;

generating second transformed image information in response to the scaled weighted image information;
generating second spatially interpolated image information in response to the second transformed image information;
generating temporally interpolated image information in response to the second spatially interpolated image information; and
generating the prior pixel image information in response to the temporally interpolated image information.

276. (Amended) A process comprising the acts of:
storing prior pixel image information [in a first memory];
storing next pixel image information [in a second memory];
generating temporally interpolated image information [in] between the prior pixel image information and the next pixel image information; and
generating transformed image information in response to the temporally interpolated image information, in response to the prior pixel image information, and in response to the next pixel image information [;
generating weight information;
generating scale factor information; and
generating scaled weighted image information in response to the transformed image information, in response to the scale factor information, and in response to the weight information].

277. (Amended) A process as set forth in claim 276, further comprising the act of:
communicating output image information over an RF data link in response to the [scaled weighted] transformed image information.

278. (Amended) A process as set forth in claim 276, further comprising the acts of:
[making a product in response to the process set forth in claim 276]
storing weight information;
storing scale factor information;
generating scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the transformed image information;
generating second transformed image information in response to the scaled weighted image information;
generating spatially interpolated image information in response to the second transformed image information;
generating second temporally interpolated image information in response to the spatially interpolated image information; and
generating the prior pixel image information in response to the second temporally interpolated image information.

279. (Amended) A process comprising the acts of:
storing prior pixel image information [in a first memory, the prior pixel image information] representing a prior image;
storing next pixel image information [in a second memory, the next pixel image information] representing a next image;
generating prior motion vector information in response to the prior pixel image information;
generating next motion vector information in response to the next pixel image information;
generating 64-pixel blocks of spatially [interpolation] interpolated image information in response to the prior pixel image information [and], in response to the next pixel image information [;
generating subpixel vector change information having subpixel resolution], in response to the prior [pixel image] motion vector information, and in response to the next [pixel image] motion vector information; and
generating [64-sample blocks of] transformed image information in response to the 64-pixel blocks of spatially [interpolation] interpolated image information, in response to the prior pixel image information, and in response to the next pixel image information [;
generating weight input information;
generating scale factor information;
writing weight information into a weight memory in response to the weight input information;
storing the weight information in the weight memory; and
generating 64-sample blocks of scaled weighted image information in response to the 64-sample blocks of transformed image information, in response to the scale factor information, and in response to the weight information stored in the weight memory].

280. (Amended) A process as set forth in claim 279, further comprising the act of:
communicating output image information over an RF data link in response to the [64-sample blocks of scaled weighted] transformed image information.

281. (Amended) A process as set forth in claim 279, further comprising the acts of:
[making a product in response to the 64-sample blocks of scaled weighted image information]
storing weight information;
storing scale factor information;
generating scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the transformed image information;
generating second transformed image information in response to the scaled weighted image information;
generating second spatially interpolated image information in response to the second transformed image information;
generating temporally interpolated image information in response to the second spatially interpolated image information; and
generating the prior pixel image information in response to the temporally interpolated image information.

284. (Amended) A system as set forth in claim 98,
wherein the spatial interpolation circuit includes a spatial interpolation processor circuit for generating the spatially [interpolation] interpolated image information in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;
wherein the subpixel vector change circuit includes a subpixel vector change processor circuit generating the subpixel vector change information having subpixel resolution in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;
wherein the weight circuit includes a weight processor circuit for generating the weight information;
wherein the scale factor circuit includes a scale factor processor circuit for generating the scale factor information;
wherein the weighting and scaling circuit includes a weighting and scaling processor circuit for generating the scaled weighted image information in response to the transformed image information generated by the transform processor, in response to the scale factor information generated by the scale factor circuit, and in response to the weight information generated by the weight circuit;
wherein the resolution reduction circuit includes a resolution reduction processor circuit for generating the reduced resolution image information in response to the scaled weighted image information generated by the weighting and scaling circuit; and

wherein the display circuit includes a display processor circuit for generating the display image information in response to the reduced resolution image information generated by the resolution reduction circuit.

285. (Amended) A system as set forth in claim 98,

wherein the first memory includes a plurality of first memories for storing the prior pixel image information, and the prior pixel image information representing the prior image;

wherein the second memory includes a plurality of second memories for storing the next pixel image information, the second memory storing the next pixel image information and the next pixel image information representing the next image;

wherein the spatial interpolation circuit includes a plurality of spatial interpolation circuits for generating the spatial<u>ly</u> [interpolation] <u>interpolated image</u> information in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;

wherein the subpixel vector change circuit includes a plurality of subpixel vector change circuits for generating the subpixel vector change information having subpixel resolution in response to the prior pixel image information stored in the first memory and in response to the next pixel image information stored in the second memory;

wherein the transform processor includes a plurality of transform processors for generating the transformed image information in response to the spatial<u>ly</u> [interpolation] <u>interpolated image</u> information generated by the spatial interpolation circuit;

wherein the weight circuit includes a plurality of weight circuits for generating the weight information;

wherein the scale factor circuit includes a plurality of scale factor circuits for generating the scale factor information;

wherein the weighting and scaling circuit includes a plurality of weighting and scaling circuits for generating the scaled weighted image information in response to the transformed image information generated by the transform processor, in response to the scale factor information generated by the scale factor circuit, and in response to the weight information generated by the weight circuit;

wherein the resolution reduction circuit includes a plurality of resolution reduction circuits for generating the reduced resolution image information in response to the scaled weighted image information generated by the weighting and scaling circuit;

wherein the image communication link includes a plurality of image communication links for communicating the output image information in response to the reduced resolution image information generated by the resolution reduction circuit;

wherein the vector communication link includes a plurality of vector communication links for communicating output subpixel vector information in response to the subpixel vector change information generated by the subpixel vector change circuit;

wherein the display circuit includes a plurality of display circuits for generating the display image information in response to the reduced resolution image information generated by the resolution reduction circuit; and

wherein the display device includes a plurality of display devices for displaying the image in response to the display image information generated by the display circuit.

381. (Amended) A system comprising:

memory means for storing a prior 64-pixel block of image information;

memory means for storing a next 64-pixel block of image information;

means for generating a plurality of temporally interpolated 64-pixel blocks of image information [in] between the prior 64-pixel block of image information and the next 64-pixel block of image information; and

means for generating transformed image information in response to the plurality of temporally interpolated 64-pixel blocks of image information<u>, in response to the prior 64-pixel block of image information, and in response to the next 64-pixel block of image information</u>.

382. (Amended) A system comprising:

memory means for storing pixel image information;

means for generating spatial<u>ly</u> [interpolation] <u>interpolated image</u> information in response to the pixel image information stored in the memory means;

means for generating subpixel difference image information having subpixel resolution by subtracting in response to the pixel image information stored in the memory means and in response to feedback information;

means for generating weight [input] information;

weight memory means;

means for writing weight <u>input</u> information into the weight memory in response to the weight [input] information, the weight memory means storing the weight <u>input</u> information;

means for generating weighted image information in response to the weight <u>input</u> information stored in the weight memory means and in response to the spatial<u>ly</u> [interpolation] <u>interpolated image</u> information; and

means for generating the feedback information in response to the weighted image information.

383. (Amended) A system comprising:

memory means for storing a prior 64-pixel block of image information;

memory means for storing a next 64-pixel block of image information;

means for generating a first temporally interpolated 64-pixel block of image information by temporally interpolating [in] between the prior 64-pixel block of image information and the next 64-pixel block of image information;

means for generating a second temporally interpolated 64-pixel block of image information by temporally interpolating [in] between the prior 64-pixel block of image information and the next 64-pixel block of image information;

means for generating a third temporally interpolated 64-pixel block of image information by temporally interpolating [in] between the prior 64-pixel block of image information and the next 64-pixel block of image information;

means for generating first transformed image information in response to the first temporally interpolated 64-pixel block of image information;

means for generating second transformed image information in response to the second temporally interpolated 64-pixel block of image information; and

means for generating third transformed image information in response to the third temporally interpolated 64-pixel block of image information.

384. (Amended) A system comprising:

memory means for storing a prior 64-pixel block of image information;

memory means for storing a next 64-pixel block of image information;

means for generating first temporally interpolated image information by temporally interpolating [in] between the prior 64-pixel block of image information and the next 64-pixel block of image information;

means for generating second temporally interpolated image information by temporally interpolating [in] between the prior 64-pixel block of image information and the next 64-pixel block of image information;

means for generating third temporally interpolated image information by temporally interpolating [in] between the prior 64-pixel block of image information and the next 64-pixel block of image information;

means for generating first transformed image information in response to the first temporally interpolated image information;

means for generating second transformed image information in response to the second temporally interpolated image information;

means for generating third transformed image information in response to the third temporally interpolated image information;

means for generating weight [input] information;

weight memory means;

means for writing weight input information into the weight memory means in response to the weight [input] information, the weight memory means storing the weight input information;

means for generating first weighted image information in response to the weight input information stored in the weight memory means and in response to the first transformed image information;

means for generating second weighted image information in response to the weight input information stored in the weight memory means and in response to the second transformed image information; and

means for generating third weighted image information in response to the weight input information stored in the weight memory means and in response to the third transformed image information.

385. (Amended) A process comprising the acts of:

storing a prior 64-pixel block of image information [in a first memory, the prior 64-pixel block of image information] representing a prior image;

storing a next 64-pixel block of image information [in a second memory, the next 64-pixel block of image information] representing a next image;

generating prior vector information in response to the prior 64-pixel block of image information;

generating next vector information in response to the next 64-pixel block of image information;

generating a temporally interpolated 64-pixel block of image information by temporally interpolating [in between the] in response to the prior 64-pixel block of image information [stored in the first memory and], in response to the next 64-pixel block of image information, [stored in the second memory;

generating subpixel vector change information having subpixel resolution] in response to the prior [64-pixel block of image] vector information [stored in the first memory], and in response to the next [64-pixel block of image] vector information [stored in the second memory];

generating [64-sample blocks of] transformed image information in response to the [prior 64-pixel block of image information stored in the first memory and in response to the next] temporally interpolated 64-pixel block of image information [stored in the second memory]; and

generating [64-sample blocks of] reduced resolution image information in response to the [64-sample blocks of] transformed image information.

386. (Amended) A process as set forth in claim 385, further comprising the acts of: [making a product]

generating data compressed image information in response to the reduced resolution image information;

storing weight information;

storing scale factor information;

generating scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the data compressed image information;

generating second transformed image information in response to the scaled weighted image information;

generating spatially interpolated image information in response to the second transformed image information;

generating second temporally interpolated image information in response to the spatially interpolated image information; and

generating the prior 64-pixel block of image information in response to the second temporally interpolated image information.

387. (Amended) A process as set forth in claim 385, further comprising the act of making a data compressed database product in response to the [64-sample blocks of] reduced resolution image information.

389. (Amended) A process as set forth in claim [385] 109, [further comprising the acts of:

making a first product; and

making a second product in response to the first product]

wherein the prior motion vector information includes prior frame horizontal-axis motion vector information and prior frame vertical-axis motion vector information; and

wherein the next motion vector information includes next frame horizontal-axis motion vector information and next frame vertical-axis motion vector information.

390. (Amended) A process comprising the acts of:

storing a frame of pixel image information in a memory;

generating spatially [interpolation] interpolated image information in response to the frame of pixel image information and in response to feedback information;

generating weight information;

generating scale factor information;

generating scaled weighted image information in response to the spatially [interpolation] interpolated image information, in response to the weight information, and in response to the scale factor information;

generating reduced resolution image information in response to the scaled weighted image information; and

generating the feedback information in response to the reduced resolution image information.

391. (Amended) A process as set forth in claim 390, further comprising the acts of: [making a product in response to the spatial interpolation information]

generating data compressed image information in response to the reduced resolution image information;

generating scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the data compressed image information;

generating transformed image information in response to the scaled weighted image information;

generating second spatially interpolated image information in response to the transformed image information;

generating temporally interpolated image information in response to the second spatially interpolated image information; and

generating the feedback information in response to the temporally interpolated image information.

394. (Amended) A process as set forth in claim 390, further comprising the acts of:

[making a first product in response to the spatial interpolation information;

making a second product in response to the first product; and

making a third product in response to the second product]

storing prior frame first field horizontal-axis motion vector information;

storing prior frame first field vertical-axis motion vector information;

storing prior frame second field horizontal-axis motion vector information;

storing prior frame second field vertical-axis motion vector information;

storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information; and
generating the spatially interpolated image information in response to the frame of pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information.

395. (Amended) A process comprising the acts of:
storing a prior 64-pixel block of image information [in a first memory];
storing a next 64-pixel block of image information [in a second memory];
generating a first temporally interpolated 64-pixel block of image information [in] between the prior 64-pixel block of image information and the next 64-pixel block of image information;
generating a second temporally interpolated 64-pixel block of image information [in] between the prior 64-pixel block of image information and the next 64-pixel block of image information;
generating a third temporally interpolated 64-pixel block of image information [in] between the prior 64-pixel block of image information and the next 64-pixel block of image information;
generating first reduced resolution image information in response to the first temporally interpolated 64-pixel block of image information;
generating second reduced resolution image information in response to the second temporally interpolated 64-pixel block of image information; and
generating third reduced resolution image information in response to the third temporally interpolated 64-pixel block of image information.

396. (Amended) A [process] system as set forth in claim [395] 121, [further comprising the act of making a product in response to the process set forth in claim 395]
wherein the prior motion vector information includes prior frame first field horizontal-axis motion vector information, prior frame first field vertical-axis motion vector information, prior frame second field horizontal-axis motion vector information, and prior frame second field vertical-axis motion vector information; and
wherein the next motion vector information includes next frame first field horizontal-axis motion vector information, next frame first field vertical-axis motion vector information, next frame second field horizontal-axis motion vector information, and next frame second field vertical-axis motion vector information.

399. (Amended) A [process] system as set forth in claim [395] 123, [further comprising the acts of:
making a first product in response to the process set forth in claim 395; and
making a second product in response to the first product]
wherein the prior motion vector information includes prior frame first field horizontal-axis motion vector information, prior frame first field vertical-axis motion vector information, prior frame second field horizontal-axis motion vector information, and prior frame second field vertical-axis motion vector information; and
wherein the next motion vector information includes next frame first field horizontal-axis motion vector information, next frame first field vertical-axis motion vector information, next frame second field horizontal-axis motion vector information, and next frame second field vertical-axis motion vector information.

402. (Amended) A [process] system as set forth in claim [109] 137, [further comprising the acts of:
making a first product; and
making a second product in response to the first product]
wherein the prior motion vector information includes prior frame horizontal-axis motion vector information and prior frame vertical-axis motion vector information; and
wherein the next motion vector information includes next frame horizontal-axis motion vector information and next frame vertical-axis motion vector information.

405. (Amended) A [process] system as set forth in claim [113] 141, [further comprising the acts of:
making a first product;
making a second product in response to the first product; and
making a third product in response to the second product]
wherein the prior motion vector information includes prior frame first field horizontal-axis motion vector information, prior frame first field vertical-axis motion vector information, prior frame second field horizontal-axis motion vector information, and prior frame second field vertical-axis motion vector information; and
wherein the next motion vector information includes next frame first field horizontal-axis motion vector information, next frame first field vertical-axis motion vector information, next frame second field horizontal-axis motion vector information, and next frame second field vertical-axis motion vector information.

407. (Amended) A process as set forth in claim 115, further comprising the acts of:
[making a computer aided design product; and
making a second product in response to the computer aided design product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information; and
generating the 64-pixel blocks of spatially interpolated image information in response to the prior pixel image information, in response to the next pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information.

408. (Amended) A process as set forth in claim 115, further comprising the acts of:
making a [first] display product in response to the 64-pixel blocks of spatially [interpolation] interpolated image information; and
making a second product in response to the [first] display product.

409. (Amended) A process as set forth in claim 125, further comprising the act of making a database product in response to the [temporally interpolated] transformed image information.

411. (Amended) A process as set forth in claim 125, further comprising the acts of:
[making a first product in response to the temporally interpolated image information;
making a second product in response to the first product; and
making a third product in response to the second product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information;
generating spatially interpolated image information in response to the prior pixel image information, in response to the next pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information; and
generating the temporally interpolated image information in response to the spatially interpolated image information.

413. (Amended) A process as set forth in claim 127, further comprising the acts of:
making a display product in response to the [64-sample blocks of] transformed image information; and
making a second product in response to the display product.

414. (Amended) A process as set forth in claim 127, further comprising the acts of:
[making a first product in response to the process set forth in claim 127; and
making a second product in response to the first product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information;
generating spatially interpolated image information in response to the prior pixel image information, in response to the next pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information; and
generating the transformed image information in response to the spatially interpolated image information.

417. (Amended) A process as set forth in claim 143, further comprising the acts of:
[making a first product in response to the process set forth in claim 143;
making a second product in response to the first product; and
making a third product in response to the second product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information;
generating spatially interpolated image information in response to the prior pixel image information, in response to the next pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information; and
generating the scaled weighted image information in response to the spatially interpolated image information.

420. (Amended) A process as set forth in claim 153, further comprising the acts of:
[making a first product; and
making a second product in response to the first product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information;

generating the spatially interpolated image information in response to the pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information.

422. (Amended) A [process] system as set forth in claim [157] 121, further comprising [the acts of]:
[making a display product in response to the scaled weighted image information; and
making a second product in response to the display product]
a satellite navigator generating satellite navigation information;
a data link communicating data link information from a remote location;
a disk memory storing disk memory information; and
a display displaying an image in response to the frame of temporally interpolated image information, in response to the satellite navigation information, in response to the data link information, and in response to the disk memory information.

423. (Amended) A process as set forth in claim 157, further comprising the acts of:
[making a first product;
making a second product in response to the first product; and
making a third product in response to the second product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information;
generating spatially interpolated image information in response to the pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information; and
generating the transformed image information in response to the spatially interpolated image information.

425. (Amended) A process as set forth in claim 161, further comprising the acts of:
[making a first product in response to the scaled weighted image information; and
making a second product in response to the first product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information;
generating spatially interpolated image information in response to the pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information; and
generating the transformed image information in response to the spatially interpolated image information.

427. (Amended) A process as set forth in claim [165] 252, further comprising the acts of:
[making a design product in response to the process set forth in claim 165; and
making a second product in response to the design product]
generating GPS navigation information;
communicating data link information from a remote location with a data link;
storing disk memory information in a disk memory; and
displaying an image in response to the spatially interpolated image information, in response to the GPS navigation information, in response to the data link information, and in response to the disk memory information.

428. (Amended) A process as set forth in claim 165, further comprising the acts of:
[making a first product in response to the scaled weighted image information;
making a second product in response to the first product; and
making a third product in response to the second product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information; and
generating the spatially interpolated image information in response to the pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector

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information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information.

430. (Amended) A process as set forth in claim [171] 258, further comprising the acts of:
[making a computer aided design product in response to the 64-sample blocks of reduced resolution image information; and
making a second product in response to the computer aided design product]
generating input image information;
generating first data compressed image information by data compressing in response to the input image information;
storing second data compressed image information in a memory in response to the first data compressed image information;
generating data decompressed image information by data decompressing in response to second data compressed image information;
generating the frame of prior pixel image information in response to the data decompressed image information;
generating the frame of next pixel image information in response to the data decompressed image information; and
displaying an image in response to the frame of spatially interpolated image information.

431. (Amended) A process as set forth in claim 171, [further comprising the acts of:
making a first product in response to the process set forth in claim 171; and
making a second product in response to the first product]
wherein the prior motion vector information includes prior frame horizontal-axis motion vector information and prior frame vertical-axis motion vector information; and
wherein the next motion vector information includes next frame horizontal-axis motion vector information and next frame vertical-axis motion vector information.

433. (Amended) A process as set forth in claim [187] 261, further comprising the acts of:
[making a display product; and
making a second product in response to the display product]
generating first data compressed image information by data compressing in response to the transformed image information;
generating communicated second data compressed image information with a data link in response to the first data compressed image information;
generating data decompressed image information by data decompressing in response to the communicated second data compressed image information; and
displaying an image in response to the data decompressed image information.

434. (Amended) A process as set forth in claim 187, [further comprising the acts of:
making a first product in response to the process set forth in claim 187;
making a second product in response to the first product; and
making a third product in response to the second product]
wherein the prior motion vector information includes prior frame first field horizontal-axis motion vector information, prior frame first field vertical-axis motion vector information, prior frame second field horizontal-axis motion vector information, and prior frame second field vertical-axis motion vector information; and
wherein the next motion vector information includes next frame first field horizontal-axis motion vector information, next frame first field vertical-axis motion vector information, next frame second field horizontal-axis motion vector information, and next frame second field vertical-axis motion vector information.

436. (Amended) A process as set forth in claim [190] 255, further comprising the acts of:
[making a computer aided design product in response to the process set forth in claim 190; and
making a second product in response to the computer aided design product]
displaying a first perspective of an image in response to the 64-pixel blocks of spatially interpolated image information; and
displaying a second perspective of the image in response to the 64-pixel blocks of spatially interpolated image information, wherein the second perspective of the image is X-axis offset from the first perspective of the image.

437. (Amended) A process as set forth in claim 190, further comprising the acts of:
[making a first product; and
making a second product in response to the first product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information; and
generating the spatially interpolated image information in response to the pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information.

439. (Amended) A process as set forth in claim [193] 273, further comprising the acts of:
[making a design product in response to the pixel image information; and
making a second product in response to the design product]
generating the scaled weighted image information as a first channel of scaled weighted image information representing a first perspective of an image in response to the transformed image information, in response to the scale factor information, and in response to the weight input information and as a second channel of scaled weighted image information representing a second perspective of the image in response to the transformed image information, in response to the scale factor information, and in response to the weight input information, wherein the second perspective of the image is horizontally offset from the first perspective of the image; and
generating multiplexed image information in response to the first channel of scaled weighted image information and in response to the second channel of scaled weighted image information.

440. (Amended) A [process] system as set forth in claim [193] 155, [further comprising the acts of:

making a first product;
making a second product in response to the first product; and
making a third product in response to the second product]
wherein the prior motion vector information includes prior frame horizontal-axis motion vector information and prior frame vertical-axis motion vector information; and
wherein the next motion vector information includes next frame horizontal-axis motion vector information and next frame vertical-axis motion vector information.

443. (Amended) A process as set forth in claim [198] 190, further comprising the acts of:
[making a first product in response to the subpixel difference image information; and
making a second product in response to the first product]
storing prior frame horizontal-axis motion vector information;
storing prior frame vertical-axis motion vector information;
storing next frame horizontal-axis motion vector information;
storing next frame vertical-axis motion vector information;
generating the spatially interpolated image information in response to the pixel image information, in response to the prior frame horizontal-axis motion vector information, in response to the prior frame vertical-axis motion vector information, in response to the next frame horizontal-axis motion vector information, and in response to the next frame vertical-axis motion vector information.

444. (Amended) A process as set forth in claim 201, further comprising the act of making an entertainment product in response to the [64-pixel blocks of spatial interpolation] weighted image information.

445. (Amended) A process as set forth in claim [201] 204, further comprising the acts of:
[making a computer aided design product in response to the process set forth in claim 201; and
making a second product in response to the computer aided design product]
storing prior frame horizontal-axis motion vector information;
storing prior frame vertical-axis motion vector information;
storing next frame horizontal-axis motion vector information;
storing next frame vertical-axis motion vector information; and
generating the 64-pixel blocks of spatially interpolated image information in response to the prior pixel image information, in response to the next pixel image information, in response to the prior frame horizontal-axis motion vector information, in response to the prior frame vertical-axis motion vector information, in response to the next frame horizontal-axis motion vector information, and in response to the next frame vertical-axis motion vector information.

446. (Amended) A process as set forth in claim 201, further comprising the acts of:
[making a first product in response to the 64-pixel blocks of spatial interpolation information;
making a second product in response to the first product; and
making a third product in response to the second product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information;
generating the 64-pixel blocks of spatially interpolated image information in response to the pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information; and
generating the transformed image information in response to the spatially interpolated image information.

448. (Amended) A process as set forth in claim 204, further comprising the acts of:
[making a first product in response to the process set forth in claim 204; and
making a second product in response to the first product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information;
generating the 64-pixel blocks of spatially interpolated image information in response to the prior pixel image information, in response to the next pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information.

450. (Amended) A process as set forth in claim 209, [further comprising the acts of:
making a first product in response to the process set forth in claim 209;
making a second product in response to the first product; and
making a third product in response to the second product]
wherein the prior motion vector information includes prior frame first field horizontal-axis motion vector information, prior frame first field vertical-axis motion vector information, prior frame second field horizontal-axis motion vector information, and prior frame second field vertical-axis motion vector information; and

wherein the next motion vector information includes next frame first field horizontal-axis motion vector information, next frame first field vertical-axis motion vector information, next frame second field horizontal-axis motion vector information, and next frame second field vertical-axis motion vector information.

451. (Amended) A process as set forth in claim 212, further comprising the act of making a television product in response to the [64-sample blocks of] transformed image information.

452. (Amended) A process as set forth in claim [212] 279, further comprising the acts of:
[making a computer aided design product in response to the process set forth in claim 212; and
making a second product in response to the computer aided design product]
generating a first channel of output image information representing a first perspective of an image in response to the transformed image information; and
generating a second channel of output image information representing a second perspective of the image in response to the first channel of output image information, wherein the second perspective of the image is from a different horizontal displacement than the horizontal displacement of the first perspective of the image; and
generating multiplexed image information in response to the first channel of output image information and in response to the second channel of output image information.

453. (Amended) A process as set forth in claim 212, [further comprising the acts of:
making a first product; and
making a second product in response to the first product]
wherein the prior motion vector information includes prior frame horizontal-axis motion vector information and prior frame vertical-axis motion vector information; and
wherein the next motion vector information includes next frame horizontal-axis motion vector information and next frame vertical-axis motion vector information.

455. (Amended) A process as set forth in claim 215, further comprising the acts of:
[making a design product in response to the transformed image information; and
making a second product in response to the design product]
storing prior frame horizontal-axis motion vector information;
storing prior frame vertical-axis motion vector information;
storing next frame horizontal-axis motion vector information;
storing next frame vertical-axis motion vector information;
generating spatially interpolated image information in response to the pixel image information, in response to the prior frame horizontal-axis motion vector information, in response to the prior frame vertical-axis motion vector information, in response to the next frame horizontal-axis motion vector information, and in response to the next frame vertical-axis motion vector information; and
generating the transformed image information in response to the spatially interpolated image information.

456. (Amended) A process as set forth in claim 215, further comprising the acts of:
[making a first product;
making a second product in response to the first product; and
making a third product in response to the second product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information;
generating spatially interpolated image information in response to the pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information; and
generating the transformed image information in response to the spatially interpolated image information.

458. (Amended) A process as set forth in claim 218, further comprising the acts of:
[making a first product in response to the scaled image information; and
making a second product in response to the first product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information;
generating spatially interpolated image information in response to the pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information; and
generating the transformed image information in response to the spatially interpolated image information.

459. (Amended) A process as set forth in claim 223, further comprising the act of making a geophysical product in response to the [64-sample blocks of] transformed image information.

460. (Amended) A process as set forth in claim 223, further comprising the acts of:
[making a computer aided design product in response to the process set forth in claim 223; and
making a second product in response to the computer aided design product]
storing prior frame horizontal-axis motion vector information;
storing prior frame vertical-axis motion vector information;
storing next frame horizontal-axis motion vector information;
storing next frame vertical-axis motion vector information;
generating spatially interpolated image information in response to the prior pixel image information, in response to the next pixel image information, in response to the prior frame horizontal-axis motion vector information, in response to the prior frame vertical-axis motion vector information, in response to the next frame horizontal-axis motion vector information, and in response to the next frame vertical-axis motion vector information; and
generating the transformed image information in response to the spatially interpolated image information.

461. (Amended) A process as set forth in claim 223, further comprising the acts of:
[making a first product;
making a second product in response to the first product; and
making a third product in response to the second product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information;
generating spatially interpolated image information in response to the prior pixel image information, in response to the next pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information; and
generating the transformed image information in response to the spatially interpolated image information.

463. (Amended) A process as set forth in claim 226, further comprising the acts of:
[making a design product in response to the transformed image information; and
making a second product in response to the design product]
storing prior frame horizontal-axis motion vector information;
storing prior frame vertical-axis motion vector information;
storing next frame horizontal-axis motion vector information;
storing next frame vertical-axis motion vector information; and
generating the frame of spatially interpolated image information in response to the frame of prior pixel image information, in response to the frame of next pixel image information, in response to the prior frame horizontal-axis motion vector information, in response to the prior frame vertical-axis motion vector information, in response to the next frame horizontal-axis motion vector information, and in response to the next frame vertical-axis motion vector information.

464. (Amended) A process as set forth in claim 226, further comprising the acts of:
[making a first product in response to the process set forth in claim 226; and
making a second product in response to the first product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information;
generating the frame of spatially interpolated image information in response to the frame of prior pixel image information, in response to the frame of next pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information; and
generating the transformed image information in response to the spatially interpolated image information.

467. (Amended) A process as set forth in claim 229, further comprising the acts of:
[making a first product in response to the process set forth in claim 229;
making a second product in response to the first product; and
making a third product in response to the second product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information;
generating the 64-pixel blocks of spatially interpolated image information in response to the prior pixel image information, in response to the next pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to

the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information.

468. (Amended) A process as set forth in claim 232, further comprising the act of making a processed product in response to the [64-sample blocks of] transformed image information.

469. (Amended) A process as set forth in claim 232, further comprising the acts of:
[making a computer aided design product in response to the process set forth in claim 232; and
making a second product in response to the computer aided design product]
storing prior frame horizontal-axis motion vector information;
storing prior frame vertical-axis motion vector information;
storing next frame horizontal-axis motion vector information;
storing next frame vertical-axis motion vector information; and
generating the 64-pixel blocks of spatially interpolated image information in response to the pixel image information, in response to the prior frame horizontal-axis motion vector information, in response to the prior frame vertical-axis motion vector information, in response to the next frame horizontal-axis motion vector information, and in response to the next frame vertical-axis motion vector information.

470. (Amended) A process as set forth in claim 232, further comprising the acts of:
[making a first product; and
making a second product in response to the first product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information; and
generating the 64-pixel blocks of spatially interpolated image information in response to the pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information.

472. (Amended) A process as set forth in claim [235] 226, further comprising the acts of:
[making a design product in response to the scaled weighted image information; and
making a second product in response to the design product]
generating a first channel of output image information representing a first perspective of an image in response to the transformed image information;
generating a second channel of output image information representing a second perspective of the image in response to the transformed image information, wherein the second perspective of the image is from a different X-axis position than the X-axis position of the first perspective of the image; and
generating multiplexed image information in response to the first channel of output image information and in response to the second channel of output image information.

473. (Amended) A process as set forth in claim 235, [further comprising the acts of:
making a first product;
making a second product in response to the first product; and
making a third product in response to the second product]
wherein the prior motion vector information includes prior frame first field horizontal-axis motion vector information, prior frame first field vertical-axis motion vector information, prior frame second field horizontal-axis motion vector information, and prior frame second field vertical-axis motion vector information; and
wherein the next motion vector information includes next frame first field horizontal-axis motion vector information, next frame first field vertical-axis motion vector information, next frame second field horizontal-axis motion vector information, and next frame second field vertical-axis motion vector information.

475. (Amended) A process as set forth in claim 238, further comprising the acts of:
[making a first product in response to the weighted image information; and
making a second product in response to the first product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information;
generating spatially interpolated image information in response to the frame of prior pixel image information, in response to the frame of next pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information; and
generating the weighted image information in response to the spatially interpolated image information.

477. (Amended) A process as set forth in claim 241, further comprising the acts of:
[making a computer aided design product in response to the process set forth in claim 241; and
making a second product in response to the computer aided design product]
storing prior frame horizontal-axis motion vector information;
storing prior frame vertical-axis motion vector information;

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storing next frame horizontal-axis motion vector information;
storing next frame vertical-axis motion vector information;
generating spatially interpolated image information in response to the prior pixel image information, in response to the next pixel image information, in response to the prior frame horizontal-axis motion vector information, in response to the prior frame vertical-axis motion vector information, in response to the next frame horizontal-axis motion vector information, and in response to the next frame vertical-axis motion vector information; and
generating the scaled weighted image information in response to the spatially interpolated image information.

478. (Amended) A process as set forth in claim 241, further comprising the acts of:
[making a first product in response to the scaled weighted image information;
making a second product in response to the first product; and
making a third product in response to the second product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information;
generating spatially interpolated image information in response to the prior pixel image information, in response to the next pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information; and
generating the scaled weighted image information in response to the spatially interpolated image information.

480. (Amended) A process as set forth in claim 244, further comprising the acts of:
[making a first product in response to the process set forth in claim 244; and
making a second product in response to the first product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information;
generating a spatially interpolated 64-pixel block of image information in response to the prior 64-pixel block of pixel image information, in response to the next 64-pixel block of pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information; and
generating the temporally interpolated 64-pixel block of image information in response to the 64-pixel block of spatially interpolated image information.

483. (Amended) A process as set forth in claim 249, [further comprising the acts of:
making a first product in response to the process set forth in claim 249;
making a second product in response to the first product; and
making a third product in response to the second product]
wherein the prior motion vector information includes prior frame first field horizontal-axis motion vector information, prior frame first field vertical-axis motion vector information, prior frame second field horizontal-axis motion vector information, and prior frame second field vertical-axis motion vector information; and
wherein the next motion vector information includes next frame first field horizontal-axis motion vector information, next frame first field vertical-axis motion vector information, next frame second field horizontal-axis motion vector information, and next frame second field vertical-axis motion vector information.

484. (Amended) A process as set forth in claim 252, further comprising the act of making a signal product in response to the [scaled weighted] spatially interpolated image information.

485. (Amended) A process as set forth in claim 252, further comprising the acts of:
[making a first product; and
making a second product in response to the first product]
storing prior frame first field horizontal-axis motion vector information;
storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information; and
generating the spatially interpolated image information in response to the prior pixel image information, in response to the next pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information.

487. (Amended) A process as set forth in claim 255, further comprising the acts of:

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[making a design product in response to the 64-sample blocks of scaled weighted image information; and

making a second product in response to the design product]

storing prior frame horizontal-axis motion vector information;

storing prior frame vertical-axis motion vector information;

storing next frame horizontal-axis motion vector information;

storing next frame vertical-axis motion vector information; and

generating the 64-pixel blocks of spatially interpolated image information in response to the prior pixel image information, in response to the next pixel image information, in response to the prior frame horizontal-axis motion vector information, in response to the prior frame vertical-axis motion vector information, in response to the next frame horizontal-axis motion vector information, and in response to the next frame vertical-axis motion vector information.

488. (Amended) A process as set forth in claim 255, further comprising the acts of:

[making a first product;

making a second product in response to the first product; and

making a third product in response to the second product]

storing prior frame first field horizontal-axis motion vector information;

storing prior frame first field vertical-axis motion vector information;

storing prior frame second field horizontal-axis motion vector information;

storing prior frame second field vertical-axis motion vector information;

storing next frame first field horizontal-axis motion vector information;

storing next frame first field vertical-axis motion vector information;

storing next frame second field horizontal-axis motion vector information;

storing next frame second field vertical-axis motion vector information; and

generating the 64-pixel blocks of spatially interpolated image information in response to the prior pixel image information, in response to the next pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information.

490. (Amended) A process as set forth in claim 258, [further comprising the acts of:

making a computer aided design product; and

making a second product in response to the computer aided design product]

wherein the prior motion vector information includes prior frame horizontal-axis motion vector information and prior frame vertical-axis motion vector information; and

wherein the next motion vector information includes next frame horizontal-axis motion vector information and next frame vertical-axis motion vector information.

491. (Amended) A process as set forth in claim [258] 218, further comprising the acts of:

[making a first product in response to the scaled weighted image information; and

making a second product in response to the first product]

storing prior frame first field horizontal-axis motion vector information;

storing prior frame first field vertical-axis motion vector information;

storing prior frame second field horizontal-axis motion vector information;

storing prior frame second field vertical-axis motion vector information;

storing next frame first field horizontal-axis motion vector information;

storing next frame first field vertical-axis motion vector information;

storing next frame second field horizontal-axis motion vector information;

storing next frame second field vertical-axis motion vector information;

generating spatially interpolated image information in response to the prior pixel image information, in response to the next pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information; and

generating the transformed image information in response to the spatially interpolated image information.

492. (Amended) A process as set forth in claim 261, further comprising the act of making an oil product in response to the [scaled weighted] transformed image information.

493. (Amended) A process as set forth in claim [261] 232, further comprising the acts of:

[making a display product in response to the process set forth in claim 261; and

making a second product in response to the display product]

generating data compressed image information in response to the transformed image information;

storing weight information;

storing scale factor information;

generating scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the data compressed image information;

generating second transformed image information in response to the scaled weighted image information;

generating second spatially interpolated image information in response to the second transformed image information;

generating temporally interpolated image information in response to the second spatially interpolated image information; and

generating the feedback image information in response to the temporally interpolated image information.

494. (Amended) A process as set forth in claim 261, further comprising the acts of:

[making a first product in response to the scaled weighted image information;

making a second product in response to the first product; and

making a third product in response to the second product]

storing prior frame first field horizontal-axis motion vector information;

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storing prior frame first field vertical-axis motion vector information;
storing prior frame second field horizontal-axis motion vector information;
storing prior frame second field vertical-axis motion vector information;
storing next frame first field horizontal-axis motion vector information;
storing next frame first field vertical-axis motion vector information;
storing next frame second field horizontal-axis motion vector information;
storing next frame second field vertical-axis motion vector information;
generating spatially interpolated image information in response to the prior pixel image information, in response to the next pixel image information, in response to the prior frame first field horizontal-axis motion vector information, in response to the prior frame first field vertical-axis motion vector information, in response to the prior frame second field horizontal-axis motion vector information, in response to the prior frame second field vertical-axis motion vector information, in response to the next frame first field horizontal-axis motion vector information, in response to the next frame first field vertical-axis motion vector information, in response to the next frame second field horizontal-axis motion vector information, and in response to the next frame second field vertical-axis motion vector information; and
generating the transformed image information in response to the spatially interpolated image information.

496. (Amended) A process as set forth in claim [264] 270, further comprising the acts of:
[making a design product in response to the weighted image information; and
making a second product in response to the design product]
generating data compressed image information in response to the scaled weighted image information;
generating second scaled weighted image information in response to the weight information, in response to the scale factor information, and in response to the data compressed image information;
generating second transformed image information in response to the scaled weighted image information;
generating spatially interpolated image information in response to the second transformed image information;
generating temporally interpolated image information in response to the spatially interpolated image information; and
generating the feedback information in response to the temporally interpolated image information.

497. (Amended) A process as set forth in claim [264] 109, further comprising the acts of:
[making a first product in response to the process set forth in claim 264; and
making a second product in response to the first product]
generating data compressed image information in response to the temporally interpolated image information;
generating spatially interpolated image information in response to the data compressed image information;
generating second temporally interpolated image information in response to the spatially interpolated image information; and
generating the prior 64-pixel block of image information in response to the second temporally interpolated image information.

499. (Amended) A process as set forth in claim [267] 115, further comprising the acts of:
[making a first product in response to the process set forth in claim 267;
making a second product in response to the first product; and
making a third product in response to the second product]
generating data compressed 64-pixel blocks of image information in response to the 64-pixel blocks of spatially interpolated image information;
generating 64-pixel blocks of second spatially interpolated image information in response to the data compressed 64-pixel blocks of image information;
generating 64-pixel blocks of temporally interpolated image information in response to the 64-pixel blocks of second spatially interpolated image information; and
generating the prior pixel image information in response to the 64-pixel blocks of temporally interpolated image information.

501. (Amended) A process as set forth in claim [270] 125, further comprising the acts of:
[making a display product in response to the process set forth in claim 270; and
making a second product in response to the display product]
generating spatially interpolated image information in response to the transformed image information;
generating second temporally interpolated image information in response to the spatially interpolated image information; and
generating the prior pixel image information in response to the second temporally interpolated image information.

502. (Amended) A process as set forth in claim [270] 127, further comprising the acts of:
[making a first product; and
making a second product in response to the first product]
generating data compressed image information in response to the transformed image information;
generating spatially interpolated image information in response to the data compressed image information;
generating temporally interpolated image information in response to the spatially interpolated image information; and
generating the prior pixel image information in response to the temporally interpolated image information.

504. (Amended) A process as set forth in claim 273, further comprising the acts of:
making a design product in response to the [64-sample blocks of] scaled weighted information; and
making a second product in response to the design product.

505. (Amended) A process as set forth in claim [273] 143, further comprising the acts of:
[making a first product;
making a second product in response to the first product; and
making a third product in response to the second product]
generating data compressed image information in response to the scaled weighted image information;
generating spatially interpolated image information in response to the data compressed image information;
generating temporally interpolated image information in response to the spatially interpolated image information; and
generating the prior pixel image information in response to the temporally interpolated image information.

507. (Amended) A process as set forth in claim [276] 153, further comprising the acts of:
[making a first product in response to the scaled weighted image information; and
making a second product in response to the first product]
generating transformed image information in response to the scaled weighted image information; and

generating the feedback image information in response to the transformed image information.

508. (Amended) A process as set forth in claim 279, further comprising the act of making a machined product in response to the [64-sample blocks of scaled weighted] transformed image information.

509. (Amended) A process as set forth in claim [279] 161, further comprising the acts of:
[making a display product in response to the process set forth in claim 279; and
making a second product in response to the display product]
generating data compressed image information in response to the scaled weighted image information;
generating second transformed image information in response to the data compressed image information; and
generating the feedback image information in response to the second transformed image information.

510. (Amended) A process as set forth in claim [279] 157, further comprising the acts of:
[making a first product in response to the 64-sample blocks of scaled weighted image information;
making a second product in response to the first product; and
making a third product in response to the second product]
generating second transformed image information in response to the scaled weighted image information; and
generating the feedback image information in response to the second transformed image information.

Please add new claims 511 - 548, as follows:

--511. A process comprising the acts of:
    storing a first field of image information;
    storing a second field of image information;
    generating first field vector information in response to the first field of image information;
    generating second field vector information in response to the second field of image information;
    generating a first field of temporally interpolated image information by temporally interpolating in response to the first field of image information, in response to the second field of image information, in response to the first field vector information, and in response to the second field vector information; and
    generating a second field of temporally interpolated image information by temporally interpolating in response to the first field of image information, in response to the second field of image information, in response to the first field vector information, and in response to the second field vector information.

--512. A process as set forth in claim 511, comprising the act of:
    generating multiplexed information by multiplexing in response to the first field of image information, in response to the second field of image information, in response to the first field of temporally interpolated image information, in response to the second field of temporally interpolated image information, in response to the first field vector information, and in response to the second field vector information.

--513. A process comprising the acts of:
    storing a first field of image information;
    storing a second field of image information;
    storing first field subpixel vector information;
    storing second field subpixel vector information;

    generating a first field of spatially interpolated image information by spatially interpolating in response to the first field of image information and in response to the first field subpixel vector information; and
    generating a second field of spatially interpolated image information by spatially interpolating in response to the second field of image information and in response to the second field subpixel vector information.

--514. A process as set forth in claim 513, comprising the act of:
    displaying an image in response to the first field of spatially interpolated image information and in response to the second field of spatially interpolated image information.

--515. A process comprising the acts of:
    storing a first field of image information;
    storing a second field of image information;
    generating first field subpixel vector information in response to the first field of image information;
    generating second field subpixel vector information in response to the second field of image information;
    generating a first field of scaled image information by scaling in response to the first field of image information and in response to the first field subpixel vector information; and
    generating a second field of scaled image information by scaling in response to the second field of image information and in response to the second field subpixel vector information.

--516. A process as set forth in claim 515, comprising the act of:
    generating multiplexed information by multiplexing in response to the first field of image information, in response to the second field of image information, in response to the first field of scaled image information, in response to the second field of scaled image information, in response to the first field subpixel vector information, and in response to the second field subpixel vector information.

--517. A process comprising the acts of:
    storing a first field of image information;
    storing a second field of image information;
    storing first field vector information;
    storing second field vector information;
    generating a first field of scaled image information by scaling in response to the first field of image information, in response to the second field of image information, in response to the first field vector information, and in response to the second field vector information; and
    generating a second field of scaled image information by scaling in response to the first field of image information, in response to the second field of image information, in response to the first field vector information, and in response to the second field vector information.

--518. A process as set forth in claim 517, comprising the act of:
    displaying an image in response to the first field of scaled image information and in response to the second field of scaled image information.

--519. A process comprising the acts of:
    storing a first field of image information;
    storing a second field of image information;
    generating first field subpixel vector information in response to the first field of image information;
    generating second field subpixel vector information in response to the second field of image information;
    generating a first field of weighted image information by weighting in response to the first field of image information, in response to the second field of image information, in response to the first field subpixel vector information, and in response to the second field subpixel vector information; and

    generating a second field of weighted image information by weighting in response to the first field of image information, in response to the second field of image information, in response to the first field subpixel vector information, and in response to the second field subpixel vector information.

--520. A process as set forth in claim 519, comprising the act of:
    generating multiplexed information by multiplexing in response to the first field of image information, in response to the second field of image information, in response to the first field of weighted image information, in response to the second field of weighted image information, in response to the first field subpixel vector information, and in response to the second field subpixel vector information.

--521. A process comprising the acts of:
      storing a first field of image information;
      storing a second field of image information;
      storing first field vector information;
      storing second field vector information;
      generating a first field of weighted image information by weighting in response to the first field of image information and in response to the first field vector
information; and
      generating a second field of weighted image information by weighting in response to the second field of image information and in response to the second field
vector information.

--522. A process as set forth in claim 521, comprising the act of:
      displaying an image in response to the first field of weighted image information and in response to the second field of weighted image information.

--523. A process comprising the acts of:
      storing a first field of image information;
      storing a second field of image information;

      generating first field subpixel vector information in response to the first field of image information;
      generating second field subpixel vector information in response to the second field of image information;
      generating a first field of transformed image information by transforming in response to the first field of image information, in response to the second field of
image information, in response to the first field subpixel vector information, and in response to the second field subpixel vector information; and
      generating a second field of transformed image information by transforming in response to the first field of image information, in response to the second field
of image information, in response to the first field subpixel vector information, and in response to the second field subpixel vector information.

--524. A process as set forth in claim 523, comprising the act of:
      generating multiplexed information by multiplexing in response to the first field of image information, in response to the second field of image information, in
response to the first field of transformed image information, in response to the second field of transformed image information, in response to the first field subpixel vector
information, and in response to the second field subpixel vector information.

--525. A process comprising the acts of:
      storing a first field of image information;
      storing a second field of image information;
      storing first field vector information;
      storing second field vector information;
      generating a first field of transformed image information by transforming in response to the first field of image information and in response to the first field
vector information; and

      generating a second field of transformed image information by transforming in response to the second field of image information and in response to the
second field vector information.

--526. A process as set forth in claim 525, comprising the act of:
      displaying an image in response to the first field of transformed image information and in response to the second field of transformed image information.

--527. A process comprising the acts of:
      storing a first field of image information;
      storing a second field of image information;
      generating first field subpixel motion vector information in response to the first field of image information;
      generating second field subpixel motion vector information in response to the second field of image information;
      generating a first field of spatially interpolated image information by spatially interpolating in response to the first field of image information, in response to
the second field of image information, in response to the first field subpixel motion vector information, and in response to the second field subpixel motion vector information; and
      generating a second field of spatially interpolated image information by spatially interpolating in response to the first field of image information, in response
to the second field of image information, in response to the first field subpixel motion vector information, and in response to the second field subpixel motion vector information.

--528. A process as set forth in claim 527, comprising the act of:
      generating multiplexed information by multiplexing in response to the first field of image information, in response to the second field of image information, in
response to the first field of spatially interpolated image information, in response to the second field of spatially interpolated image information, in response to the first field
subpixel motion vector information, and in response to the second field subpixel motion vector information.

--529. A process comprising the acts of:
      storing a first field of image information;
      storing a second field of image information;
      storing first field motion vector information;
      storing second field motion vector information;
      generating a first field of interpolated image information by interpolating in response to the first field of image information, in response to the second field of
image information, in response to the first field motion vector information, and in response to the second field motion vector information; and
      generating a second field of interpolated image information by interpolating in response to the first field of image information, in response to the second field
of image information, in response to the first field motion vector information, and in response to the second field motion vector information.

--530. A process as set forth in claim 529, comprising the act of:
      displaying an image in response to the first field of interpolated image information and in response to the second field of interpolated image information.

--531. A process comprising the acts of:
      storing a first field of image information;
      storing a second field of image information;

generating first field subpixel motion vector information in response to the first field of image information;

generating second field subpixel motion vector information in response to the second field of image information;

generating a first field of scaled image information by scaling in response to the first field of image information, in response to the first field subpixel motion vector information; and

generating a second field of scaled image information by scaling in response to the second field of image information, and in response to the second field subpixel motion vector information.

--532. A process as set forth in claim 531, comprising the act of:

generating multiplexed information by multiplexing in response to the first field of image information, in response to the second field of image information, in response to the first field of scaled image information, in response to the second field of scaled image information, in response to the first field subpixel motion vector information, and in response to the second field subpixel motion vector information.

--533. A process comprising the acts of:

storing a first field of image information;

storing a second field of image information;

storing first field motion vector information;

storing second field motion vector information;

generating a first field of scaled image information by scaling in response to the first field of image information, in response to the second field of image information, in response to the first field motion vector information, and in response to the second field motion vector information; and

generating a second field of scaled image information by scaling in response to the first field of image information, in response to the second field of image information, in response to the first field motion vector information, and in response to the second field motion vector information.

--534. A process as set forth in claim 533, comprising the act of:

displaying an image in response to the first field of scaled image information and in response to the second field of scaled image information.

--535. A process comprising the acts of:

storing a first field of image information;

storing a second field of image information;

generating first field motion vector information in response to the first field of image information;

generating second field motion vector information in response to the second field of image information;

generating a first field of weighted image information by weighting in response to the first field of image information, in response to the second field of image information, in response to the first field motion vector information, and in response to the second field motion vector information; and

generating a second field of weighted image information by weighting in response to the first field of image information, in response to the second field of image information, in response to the first field motion vector information, and in response to the second field motion vector information.

--536. A process as set forth in claim 535, comprising the act of:

generating multiplexed information by multiplexing in response to the first field of image information, in response to the second field of image information, in response to the first field of weighted image information, in response to the second field of weighted image information, in response to the first field motion vector information, and in response to the second field motion vector information.

--537. A process comprising the acts of:

storing a first field of image information;

storing a second field of image information;

storing first field subpixel motion vector information;

storing second field subpixel motion vector information;

generating a first field of weighted image information by weighting in response to the first field of image information and in response to the first field subpixel motion vector information; and

generating a second field of weighted image information by weighting in response to the second field of image information, and in response to the second field subpixel motion vector information.

--538. A process as set forth in claim 537, comprising the act of:

displaying an image in response to the first field of weighted image information and in response to the second field of weighted image information.

--539. A process comprising the acts of:

storing a first field of image information;

storing a second field of image information;

generating first field motion vector information in response to the first field of image information;

generating second field motion vector information in response to the second field of image information;

generating a first field of transformed image information by transforming in response to the first field of image information, in response to the first field motion vector information; and

generating a second field of transformed image information by transforming in response to the second field of image information, and in response to the second field motion vector information.

--540. A process as set forth in claim 539, comprising the act of:

generating multiplexed information by multiplexing in response to the first field of image information, in response to the second field of image information, in response to the first field of transformed image information, in response to the second field of transformed image information, in response to the first field motion vector information, and in response to the second field motion vector information.

--541. A process comprising the acts of:

storing a first field of image information;

storing a second field of image information;

storing first field subpixel motion vector information;

storing second field subpixel motion vector information;

generating a first field of transformed image information by transforming in response to the first field of image information, in response to the second field of image information, in response to the first field subpixel motion vector information, and in response to the second field subpixel motion vector information; and

generating a second field of transformed image information by transforming in response to the first field of image information, in response to the second field of image information, in response to the first field subpixel motion vector information, and in response to the second field subpixel motion vector information.

--542. A process as set forth in claim 541, comprising the act of:

displaying an image in response to the first field of transformed image information and in response to the second field of transformed image information.

--543. A process as set forth in claims 109, 113, 115, 125, 127, 143, 153, 157, 161, 165, 171, 187, 531, 533, 535, 537, 539, and 541, further comprising the acts of:

making a first product in response to the process; and

making a second product in response to the first product.

--544. A process as set forth in claims 190, 193, 198, 201, 204, 209, 212, 215, 218, 523, 525, 527, and 529, further comprising the acts of:

making a first product; and

making a second product in response to the first product.

--545. A process as set forth in claims 223, 226, 229, 232, 235, 238, 241, 244, 249, 252, 255, 511, 513, 515, 517, 519, and 521, further comprising the acts of:

making a first product in response to the process;

making a second product in response to the first product; and

making a third product in response to the second product.

--546. A process as set forth in claims 258, 261, 264, 267, 270, 273, 276, 279, 385, 390, and 395, further comprising the acts of:

making a first product;

making a second product in response to the first product; and

making a third product in response to the second product.

--547. A process as set forth in claims 109, 113, 115, 125, 127, 143, 153, 157, 161, 165, 171, 187, 190, 193, 198, 201, 204, 209, 212, 215, 218, 223, 226, 523, 525, 527, 529, 531, 533, 535, 537, 539, and 541, further comprising the act of making a product in response to the process.

--548. A process as set forth in claims 229, 232, 235, 238, 241, 244, 249, 252, 255, 258, 261, 264, 267, 270, 273, 276, 279, 385, 390, 395, 511, 513, 515, 517, 519, and 521, further comprising the act of making a product.